

Weight Stigma in Britain: The Linguistic Representation of Obesity in
Newspapers

Tara Coltman-Patel

A thesis submitted in partial fulfilment of the requirements of Nottingham Trent

University for the degree of Doctor of Philosophy

May 2020

This work is the intellectual property of the author. You may copy up to 5% of this work for private study, or personal, non-commercial research. Any re-use of the information contained within this document should be fully referenced, quoting the author, title, university, degree level and pagination. Queries or requests for any other use, or if a more substantial copy is required, should be directed to the owner(s) of the Intellectual Property Rights.

Acknowledgements

For two years my PhD was funded by the Arts and Humanities Research Council's Midlands 4 Cities doctoral training partnership. Thank you to them for their financial support and for the wonderful opportunities the training partnership afforded. I am particularly grateful for the placement programme as I was able to, with M4C's support, take three months away from my research to do a placement at the World Obesity Federation where I worked on an international campaign. This fantastic opportunity would not have been possible without the support of M4C.

On a related note, I would like to thank the boundlessly generous Andrew Coltman, who offered his financial support during the first year of my studies. Thank you Uncle Andrew, for this, and for a lifetime of wise words, unconditional support and love. I would not be in this position today without you.

Two individuals for whom I am especially thankful are Dr Natalie Braber and Dr David Wright, who comprised my fantastic supervisory team. I have worked closely alongside both of them since 2015 and they have both been a never-ending source of support and inspiration. David, thank you for your infinite expertise, humour and invaluable advice. You've made this experience enjoyable and unforgettable. Natalie, thank you for your patience, kindness, encouragement and your fantastic guidance. You've been a wonderful, supportive champion throughout these years and great inspiration for me.

The entire Linguistics Department at NTU are fantastic and together create a supportive, encouraging and nurturing research environment. From the wide-ranging, captivating seminars you've organised to the extremely enjoyable social events, you have all brought so much insight and fun throughout this process. Laura, Jamie, Lydia and Charlotte, I am so glad our paths crossed as a result of this experience and I hope to continue our great friendship long after it is over.

The wonderful friendships I formed throughout this process extended beyond the Linguistics department. Siân, Helen, Suzy and Amy, thank you for taking me under your wing when I was the only PhD student in the Linguistics department. Thank you for all of the cinema dates, dinner parties and fun outings, thank you for providing distractions when needed, support when needed and wine when needed.

Also, to the friendships formed before all of this. Emily, Tash, Flo, Octavia, Chrissie, Shannon and Emma. I'm incredibly lucky to have such a supportive network of girlfriends who have provided much needed escapes from the academic world throughout the last three and half years. Thank you to all of you for your unconditional support and encouragement, you all mean the world to me.

Last but certainly not least, my parents. There are no words worthy or accurate enough to describe the thanks, gratitude and love I have for you. The road here has been rocky and you have borne witness to some of the hardest parts, wiping tears, providing chocolate and offering words of comfort and encouragement. Mum, I love that you try and fail every time to use linguistic terminology properly! Your humour and your hugs have been indispensable throughout this process. Dad, I love the debates that we have. Your life and your career have and will continue to serve as an endless source of inspiration for me. None of this would have been possible without both of you, everything I have done, everything I will do, is in large because of you.

Table of Contents

Abstract	viii
1. Introduction	1
2. Literature Review	12
2.1 Weight Bias	12
2.1.1 Biased Ideologies	13
2.1.2 Stigmatising Acts	16
2.1.3 Effects of Weight Bias and Stigma	18
2.1.4 Fat Acceptance Movement	20
2.2 Representation of Marginalised Groups in Media Discourse	22
2.3 Science and Health in News Discourse	35
2.4 Obesity in News Discourse	45
2.5 Metaphors in Health and News Discourse	56
2.6 Intertextuality	66
2.7 Personal Stories in News Discourse	78
2.8 Contextualising this Research	86
3. Methodology	89
3.1 Obesity in the British Press (OiBP) Corpus Design	90
3.1.1 OiBP Collection and Clean Up	92
3.1.2 Personal Stories Sub-Corpus	94
3.2 Analytical Approach	95
3.2.1 Corpus Linguistics: Tools and Techniques	96
3.2.2 Critical Discourse Analysis	103
3.2.3 Corpus-Assisted Critical Discourse Analysis	108
3.3 Framework of Analysis	111
3.3.1 Macrostructures	111
3.3.2 Ideological Square	114
3.3.3 Self and Other Representation Strategies	115
4. Fighting the Obesity Epidemic: The Metaphorical Conceptualisation of Obesity	119
4.1 Analysis Introduction: The Results Which Will Inform all Analyses	119
4.2 Metaphors in Broadsheets vs Tabloids	126
4.3 Obesity is an Epidemic	128
4.3.1 Is Obesity an Epidemic?	128

4.3.2 <i>Epidemic</i> in Use	132
4.3.3 Direct Reference to Obesity/Weight	134
4.3.4 Blaming Obesity for Epidemics of Other Conditions and Comparisons to Previous Epidemics	141
4.3.5 Sociological Impact of the ' <i>Obesity Epidemic</i> '	145
4.3.6 ' <i>Obesity Epidemic</i> ' Conclusions	148
4.4 War-Themed Metaphors	149
4.4.1 Noun Variations of the War-Themed Metaphors	151
4.4.2 Verb Variations of the War-Themed Metaphors	158
4.5 Chapter Conclusions	165
5. Reproducing Scientific Discourse in Media Discourse: Turning Obesity Fact into Obesity Fiction	169
5.1 Chapter Introduction	169
5.2 Broadsheet vs Tabloid	172
5.3 Legitimation	174
5.3.1 Authorisation Through Reporting Verbs	175
5.3.2 Authorisation Through Social Actors	177
5.4 Topics Introduced by the SOCIAL ACTOR + REPORTING VERB Collocate Pairs	183
5.4.1 Obesity Can Cause X and Obesity is a Burden on Public Resources	186
5.4.2 Weight-Normative Approaches to Health	194
5.5 Challenging the Dominant Narrative	199
5.6 Journalistic Motivations and Procedures	202
5.7 Chapter Conclusions	207
6. Antithetical Identities in Personal Stories: The Rigid Dichotomy Between Fat and Thin	211
6.1 Chapter Introduction	211
6.2 Keyword Analysis	213
6.3 <i>Feel</i> and <i>Felt</i>	215
6.3.1 <i>Feel</i> + <i>Better</i>	218
6.3.2 <i>Feel/Felt</i> + POSITIVE ADJECTIVES	222
6.3.3 <i>Feel/Felt</i> + NEGATIVE ADJECTIVES	229
6.4 Negative Self Representation	238
6.4.1 Further Emphasis of Our Negative Characteristics	241
6.5 The Wider Commercial Goal of the Newspapers	247

6.6 Chapter Conclusions	255
7. Conclusion	259
7.1 Critical Reflections	262
7.2 Further Directions	263
7.3 Action Research	264
8. Bibliography	266
9. Appendices	296

List of Tables and Figures

Introduction

Table 1.1: National Obesity Numbers and Trends 2006 – 2016	5
--	---

Methodology

Table 3.1: Frequency of Articles Published Throughout the Years, Newspapers and Newspaper Types	91
Figure 3.1: Screen Shots from Sketch Engine – Pronominal Possessors of <i>Obesity</i> and <i>Weight</i>	95
Figure 3.2: Fairclough’s Three-Dimensional Approach to CDA	105
Figure 3.3: Semantic Microstructures and Macrostructures	112
Figure 3.4: van Dijk’s Ideological Square	114
Figure 3.5: Reisigl and Wodak’s Five-Pronged Strategy of Representation	115

Fighting the Obesity Epidemic: The Metaphorical Conceptualisation of Obesity

Table 4.1: Top 50 Keywords in OiBP	120
Table 4.2: Keywords Organised into Semantic Categories	121
Table 4.3: <i>Obesity</i> Sketch Engine Results	123
Table 4.4: <i>Epidemic</i> Relative Frequencies	127
Table 4.5: Relative Frequency of Individual War Metaphors in Broadsheet and Tabloid Newspapers	128
Table 4.6: How <i>Epidemic</i> is Used in OiBP	134
Table 4.7: Diachronic Analysis of <i>Obesity Epidemic</i> Use Throughout OiBP	139
Table 4.8: War-Themed <i>Obesity</i> Collocates	150
Table 4.9: Preposition Variations of the <i>Obesity</i> + <i>War</i> Metaphors	154
Table 4.10: Frequency of <i>Fight</i> and <i>Battle</i> as Nouns and Frequency of their Co-Occurrence with <i>Against</i>	156
Table 4.11: Individuals, Groups and Items Positioned Against Obesity in Each Specific War Metaphor	161

Reproducing Scientific Discourse in Media Discourse: Turning Obesity Fact into Obesity Fiction

Table 5.1: Expert Social Actors in Top 100 Keywords	169
Table 5.2: Top 50 Reporting Verb Collocates of Keywords of Interest	171
Table 5.3: SOCIAL ACTOR + REPORTING VERB Broadsheet vs Tabloid Frequencies	172
Table 5.4: Collocate Pairs: Broadsheet vs Tabloid Frequencies	173

Table 5.5: Power-Enhancing Collocates of the SOCIAL ACTOR + REPORTING VERB Collocate Pairs	179
Table 5.6: Topics Discussed by the Scientific and Expert Sources	184
Antithetical Identities in Personal Stories: The Rigid Dichotomy Between Fat and Thin	
Table 6.1: Distribution of Personal Stories across Broadsheet and Tabloid Newspapers	212
Table 6.2: Personal Story Sub-Corpus Top 50 Keywords	214
Table 6.3: R1 and R2 Adjectives of <i>Feel</i>	216
Table 6.4: R1 and R2 Adjectives of <i>Felt</i>	217
Table 6.5: <i>Feel/Felt</i> + POSITIVE ADJECTIVE Topics	223
Table 6.6: <i>Feel/Felt</i> + NEGATIVE ADJECTIVE Topics	230
Table 6.7: Adjective Co-Occurrence Patterns	235
Figure 6.1: Proposed Ideological Pentagon	241
Table 6.8: R1 Collocates of <i>I</i> in the Personal Stories Sub-Corpus	242
Table 6.9: Advertisements in Personal Stories	252

Abstract

It is argued that weight discrimination is one the last socially accepted forms of discrimination. In the UK, weight is not listed as a legally protected characteristic under the 2010 Equality Act. This leaves individuals with obesity with no legislative support when faced with discrimination in places such as employment and education settings. In addition, the media are criticised as being a main catalyst through which negative ideologies about weight are introduced, reproduced, naturalised and advertised, as current journalistic guidelines surrounding discrimination do not make reference to weight. To analyse this further, this research explores the representation of obesity and individuals with obesity in British national newspapers from 2006 - 2016, with a corpus comprised of 16,419 articles and 9,750,159 words. The overarching aims of this research are to identify the prevalent linguistic patterns within the British obesity media narrative and analyse the extent to which they stigmatise obesity and people with obesity. Taking a corpus-assisted approach, keywords and frequent collocation, colligation and concordance patterns are identified using Corpus Linguistic tools, and then critically analysed within the analytical framework of Critical Discourse Analysis. A variety of linguistic features and patterns are analysed including, metaphors, scientific and expert social actors and the reporting verbs which collocate with them and the colligation patterns of verbs, pronouns, adjectives and presupposition triggers. The semantic implications of the prevalent linguistic patterns are negative and dehumanising to individuals with obesity. It is argued this can promote socially divisive ideologies which position people with obesity against the rest of society. In addition, the linguistic patterns analysed all contribute towards a homogenous narrative which focuses on the prevalence of obesity, the health and economic ramifications of obesity and actions to be taken in response to obesity. It is argued this narrative sensationalises and misrepresents the issue of obesity, thereby simultaneously further accentuating the socially divisive ideologies identified at the

micro-linguistic level, while misinforming audiences about obesity. Overall, this investigation finds that the British obesity media narrative has a deficit of balanced facts, compassion and respect to those with obesity and a surplus of sensationalism, misrepresentation and stigmatisation. It is argued that, given the influential platform of national newspapers, the sociological impact of this can be devastating and a revaluation of the way in which the issue of obesity is reported on is crucial to address this.

1. Introduction

‘The obesity epidemic is the worst epidemic to afflict this country for 90 years.’ This was a statement made in an article published in *The Daily Telegraph* on the 12th July 2013. The article goes on to discuss the health ramifications of obesity, ‘diabetes, high blood pressure, strokes’, it discusses the ‘chaos’ and ‘burden’ obesity causes and places on the National Health Service and it discusses how ‘poor diets and sedentary lifestyles’ underpin the ‘chaos’, ‘burden’ and illness. The statement that obesity is the *worst* epidemic, as evidenced by the remainder of the article is saturated with ideological underpinnings which lead to several analytical questions. Is it the *worst* because of the associated illnesses? Is it the *worst* because of the economic ramifications? Or is it the *worst* because of the individuals for which the label ‘obesity’ represents? The individuals with ‘poor diets and sedentary lifestyles’, who according to this article, cause all of the above? *Worst* is an adjective with negative semantic connotations. Some of the most frequent collocates of *worst* in the British National Corpus, amidst *fear* and *nightmare* include, *enemy*, *enemies* and *offender*. Applying the notion of semantic prosody, the ‘habitual association between the semantic connotations of frequently co-occurring words’ (Louw 1993: 158), does the use of *worst* in this example create a semantic parallel between obesity, *fear* and *nightmares*? Are people with obesity being denotatively paralleled with *enemies* and *offenders*? What are the social impacts of the specific linguistic choices made in obesity related media discourse? Do the implications created by these linguistic choices provide an accurate and fair depiction of society and those they specifically reference? These are the types of questions this research asks about the language used to conceptualise the issue of obesity and people with obesity in British national newspapers. As Baker, Gabrielatos and McEnery (2013a) argue, ‘the media present information about world events to masses of individuals. As it is never possible to present a completely impartial, accurate and full account of an event, instead the media offer

representations of events’ (Baker, Gabrielatos and McEnery 2013a: 3). It is these representations which are under analysis in this investigation. Following the definitions of Johnston (2008), Jones (2012), Paltridge (2012) and Gee (2014), this thesis characterises *discourse*, *representation* and *ideology* in specific ways. The term *discourse* is used as a mass noun to refer to instances of communication through the medium of language, specifically, language in use and language in context (Johnston 2008: 2; Gee 2014: 19-20). The analysis of discourse in this investigation examines how context can give meaning to linguistic structures and how these linguistic structures can give significance to *ideologies* (Gee 2014: 20). *Ideology(ies)* is used to reference systems of and sets of ideas that reflect the beliefs held by individuals and groups about the world (Paltridge 2012: 243). Such ideas can include beliefs about what is good and bad, right and wrong, normal and abnormal (Johnston 2008: 3; Jones 2012: 11). Ideologies provide models of what the world is ‘supposed to be’ and can influence the way language is produced and interpreted (Johnston 2008: 3; Jones 2012: 11). The term *representation* is specifically utilised when discussing how individuals, groups and issues are characterised. In language there are very few neutral ways to represent individuals, groups and issues and there are a variety of linguistic strategies which can be used to shape representations which have specific ideological underpinnings (Reisigl and Wodak 2001: 46; Machin and Mayr 2012: 77). The definitions of *representation* and *ideology* are interrelated and can overlap as ideologies can influence the way in which an issue, individual or group are represented within discourse. In addition, the representations of issues, individuals and groups within discourse can perpetuate certain ideologies. Taking these definitions into account, this thesis examines the representation of obesity and people with obesity in British national newspapers between January 2006 and December 2016. Supplementary to this, the thesis is an investigation into the extent to which the representation of obesity and people with obesity perpetuates biased and stigmatising ideologies.

At present, we live in a society bound by a social hierarchy which places certain social groups above others based on a myriad of characteristics such as age, race, gender, religion, sexuality, disability and body weight. It has been established that within media discourse, language fosters this social hierarchy and these groups are often subject to a homogenous narrative which is selective, misrepresentative and exaggerated in parts (Manning-Miller 1994; Baker 2005; Baker and Gabrielatos 2008; Baker et al. 2008; Carlin and Winfrey 2009; Ma 2014; Murray 2014; Turner et al. 2018). These narratives can perpetuate false stereotypes and subtly incite discrimination and stigma towards the social groups in which they reference. Within this list, body weight is the only characteristic which is not currently legally protected under the UK Equality Act or under journalistic codes of practice surrounding discrimination (Equality Act 2010; Independent Press Standards Organisation 2020). As a result of factors such as these, it is argued that obesity and weight are amongst the only characteristics for which overt societal and systemic discrimination is still socially accepted (Puhl and Brownell 2001: 788). *Black's Medical Dictionary* defines obesity as 'a condition in which energy stores in the body (mainly fat) are too large' (Marcovitch 2005: 504). *Too large* in regard to body fat is measured by the World Health Organisation as having a body mass index of 30 or above (World Health Organisation 2020a). There is much contestation surrounding body mass index (BMI) as a measure of obesity, as technically BMI is a measure of the proportions of body weight to height as opposed to body fat (Oliver 2006: 25). In addition, BMI does not account for fitness levels and muscle mass, thereby inaccurately labelling many athletes for example, such as rugby players, American football players and wrestlers as obese (Oliver 2006: 21). Despite the pervasive debate, BMI has become the universal measure by which *obesity* and *overweight* are defined (World Health Organisation 2020a). A BMI score which falls between the range of 25-29 is considered overweight and a BMI score of 30 and above is considered obese (World Health Organisation 2020a). National figures from the Health and

Social Care Information Centre show that over the years covered in this research, approximately one quarter of the British population were categorised under the label ‘obese’ (Table 1.1), making people with obesity a significant social group within society.

Within the UK, and most of the western world, obesity is typically understood as a looming public health disaster (Saguy 2013: 5). The factors which lead to obesity are argued to include our social environment, which is characterised as ‘having an unlimited supply of convenient, relatively inexpensive, highly palatable, energy dense foods’ (Hill and Peters 1998: 1371). Our social environment and advances in technology also facilitate a reduced level of physical activity, which can lead to a consumption of more energy than one burns, which results in an increase in fatty tissue (Hill and Peters 1998: 1371). In addition, socioeconomics are argued to play a role, with research highlighting that people with lower socioeconomic resources, both as children and adults, are more likely to have a higher BMI as they face financial barriers in terms of healthy eating (Burgoiné et al. 2017; Mayor 2017). Another popular, neoliberalist view is that obesity is entirely the fault of the individual. Specifically, there is large element of personal blame including laziness, lack of motivation and poor self-control associated with obesity (Grol-Prokopczyk 2010: 360).

Table 1.1: National Obesity Numbers and Trends 2006 - 2016

	2006	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016
Men											
<i>Obese</i>	25%	24%	24%	22%	26%	24%	24%	26%	24%	27%	26%
<i>Overweight and Obese</i>	67%	65%	66%	66%	68%	65%	67%	67%	65%	68%	40%*
Women											
<i>Obese</i>	25%	24%	25%	24%	26%	26%	25%	24%	27%	27%	27%
<i>Overweight and Obese</i>	56%	56%	57%	57%	58%	58%	57%	57%	58%	58%	30%*
Children											
<i>Obese</i>	16%	17%	16%	16%	17%	17%	14%	16%	17%	15%	16%
<i>Overweight and Obese</i>	30%	31%	30%	30%	30%	30%	28%	30%	31%	30%	12%*

(Health and Social Care Information Centre 2006 - 2016)

* These figures provided by the Health and Social Care information centre in 2016 account for the number of men, women and children who were overweight, as opposed to overweight *and* obese and as a result, these three figures have been affected.

This ideology catalyses many negative and prejudicial social attitudes towards weight, and obesity is often correlated with attributes such as unattractiveness, low-intelligence and poor self-control. Biased attitudes towards weight and individuals with obesity are widespread and they lead to the discrimination and stigmatisation of those who are perceived to carry excess weight (Pearl 2018: 146). Weight stigma has negative outcomes on physical, physiological and mental health, yet its prevalence is not met with the same level of justified indignation compared with other forms of discrimination such as gender discrimination or racial discrimination (see section 2.1.3). This fact, in addition to the fact that people with obesity comprise a significant portion of the population, yet they are not legally protected from discrimination, is why the focus of this research is on obesity.

Much of the societal messaging surrounding obesity is negative and as discussed, pervasive social attitudes about weight in excess of what is deemed socially acceptable are largely pejorative. As a result, weight loss is an idealised phenomenon, to the extent that losing weight has become commercialised with health and fitness now being a multi-billion-pound industry (Crimson Hexagon 2015). Furthermore, public health messaging surrounding obesity is also largely negative, with some doctors and scientists arguing that obesity is growing at an alarming rate and it is damaging to health, increasing the chances of further disease (Bond 2011; Shuanglong, Chen and Guangye 2018). This position has also been adopted within the civic sector, with national and global non-government organisations calling for actions to reduce and eradicate obesity such as The World Obesity Federation and The British Obesity Society. In addition, other charitable organisations incorporate negative obesity-related ideologies into their work, such as Cancer Research UK who shape national campaigns around the premise that ‘obesity causes cancer’ (Cancer Research UK 2020). These arguments surrounding obesity incite debate and there is a field within academia specifically focused on dismantling popularised ideologies about weight and obesity. The

field of Fat Studies is interdisciplinary and, at its core works towards the identification and elimination of bias and prejudice based on body weight, shape, and size (Watkins, Farrell and Doyle-Hugmeyer 2012: 180). In addition to rejecting the inherent denigration of fat bodies within contemporary society, Fat Studies, as described by Watkins, Farrell and Doyle-Hugmeyer (2012: 181),

‘Explores the connections between weight and culture, examining fatness not just as a public health issue, but as a socially, historically, morally, and politically constructed category tied up with cultural understandings of gender, race and class.’

There is a distinct intersection between Fat Studies and Linguistics as language is a predominant method through which weight discrimination is carried out, the media being reported as one of the primary perpetrators of weight bias and discrimination. In addition, an analytical framework within the field of Linguistics, Critical Discourse Analysis, is built upon similar principles to those which inspire the Fat Studies field. A primary objective of Critical Discourse Analysis (CDA) is to identify ideologically charged language and examine its significance in social relations and social contexts (Fairclough 2010: 231). A focal point within this framework is addressing ‘social wrongs in their discursive aspects and proposing possible ways of righting or mitigating them’ (Fairclough 2010: 10-11). Therefore, in addition to analysing the language under examination, within the framework of a CDA analysis, the relationship between language and sociological variables such as gender, class and race are also analysed (Fairclough 2010: 231). Addressing ‘social wrongs’ with regard to weight and examining ways in which these social wrongs intersect with other pervasive social wrongs in areas such as gender, class and race is the primary goal of research within the field of Fat Studies. Despite the clear intersection between Fat Studies and Linguistics, specifically Critical Discourse Analysis, few studies within the Fat Studies field have drawn

on linguistic theory and analysis in their discussions and few studies within the Linguistics field have focused on obesity related discourse. This research aims to bridge the research gap between these two fields by systematically analysing the way obesity and people with obesity are linguistically constructed in media discourse. In addition, the analysis will include discussions surrounding if and how and the extent to which the linguistic constructions of weight coalesce with cultural constructions of weight to create a stigmatising narrative and portrayal.

This study is comprised of three analyses, all of which have the following primary aims:

- (i) Identify the prevalent linguistic patterns and messages surrounding obesity in British newspapers.
- (ii) Investigate how individuals with obesity are conceptualised within these linguistic patterns and messages.
- (iii) Explore the extent to which the linguistic patterns and messages under analysis could perpetuate weight bias and stigmatising attitudes.

Although all of the analysis chapters work to fulfil these broad aims, once the first analysis chapter (chapter 4) had been completed, there was a better, albeit preliminary, understanding of the emerging prevalent linguistic patterns and messages. Therefore, in the subsequent analysis chapters (chapters 5 and 6), specific research questions are introduced to provide a clearer analytical focus and to introduce a comparative element into the analysis. Specifically, the results found in subsequent analyses are compared to the results found previously to investigate the consistency of the messages, ideologies and representations which emerge from the linguistic patterns under analysis.

The thesis is comprised of seven chapters; an introduction, a literature review, a methodology, three analysis chapters and a conclusion. The literature review, chapter 2, contextualises this research and situates it within the research which currently exists in the

fields of Linguistics, Fat Studies, Psychology and Sociology. Specifically, it examines and discusses the way in which the linguistic focus of the project can complement the evidence found and arguments made in research focusing on the nature of weight bias. In addition, it highlights the unique nature of the data used in this investigation compared to existing studies which have analysed the obesity media narrative. It discusses the various ways in which the large amount of data analysed in this research can enhance and work to further corroborate the arguments made concerning the language and the ideologies embedded within the language used in obesity news discourse. Finally it discusses how in addition to being omitted from the list of protected characteristics in journalism and UK legislation, obesity and weight have currently been largely omitted from linguistic-focused analyses into the media representations of marginalised groups and the media representations of science and health issues. In sum, this chapter highlights the research gaps in which it can fill, offers discussions about the variety of ways it can complement the wide range of research with which it interrelates and finally, demonstrates the ways in which this project is innovative. The third chapter focuses on the methodological approach taken in this research. To achieve the primary aims set out above, a corpus-assisted approach to Critical Discourse Analysis is carried out, wherein pervasive language patterns found within the corpus of news articles are critically analysed. In addition to the analysis of the specific lexical and grammatical patterns identified, an analysis of factors which could influence language choices such as politics, science and capitalism are incorporated into the discussion. In addition, the social implications of the representations found are analysed and discussed within a Critical Discourse Analysis framework.

As discussed, the thesis is split into three main research areas, and chapters 4, 5 and 6 offer in-depth analyses and discussions surrounding each of the three analytical paths taken in this investigation. The analysis begins in chapter 4, with an exploration into the metaphorical

conceptualisation of weight and obesity. This is one of the most frequent and statistically significant linguistic patterns within the data. The chapter explores how obesity and people with obesity are conceptualised through the use of metaphor and discusses the semantic and social implications of such conceptualisations. More specifically, it considers the labels and attributes ascribed to those who have obesity through the pervasive metaphors and discusses the extent to which these metaphors sensationalise and dehumanise the issue and incite social divisiveness. In addition, parallels are drawn between the semantic implications created by the metaphors, the potential social implications and predominant arguments which exist within the Fat Studies field. This chapter provides further evidence towards arguments concerning the subtle nature of weight bias and the significance conceptual metaphors can hold in the production and shaping of media narratives. As discussed, obesity is an issue which relates to science and health. Chapter 5 is an examination into the reproduction of scientific research and expert opinion surrounding weight and obesity within the media. As this research is focused on social representations, the way in which the scientist and expert sources are introduced and represented are explored and compared to those of individuals with obesity. In addition, the discussions which ensue centre around three key areas. The first is the specific way research and opinions are recontextualised to fit within a media narrative. Following this is an in-depth wider contextual analysis and review of existing scientific research within the area of obesity to determine whether a balanced and accurate representation of information is provided within the obesity media narrative. The third aspect of the discussion involves re-introducing theories from Fat Studies about weight bias to evaluate how and if the research and opinions under analysis stigmatise weight and individuals with obesity. Finally, included in the discussion and summation of this chapter is an exploration into how journalistic procedures, including factors such as time constraints and press releases, affects the content of news articles. Chapter 6 is the final analysis chapter

and focuses on personal stories within news discourse. This is unique compared to chapters 4 and 5 because it is only the stories which incorporate the voices of the individuals at the core of this issue, people with lived experience of obesity that are analysed. Participants from previous ethnographic research into the lived experience of obesity have reported and detailed how stigma and prejudice has negatively shaped their lives (Puhl et al. 2008; Ogden and Clementi 2010). Therefore, the purpose of this chapter is to compare and contrast how people with and people who have experienced obesity conceptualise themselves compared to how they are conceptualised by other actors such as journalists and scientists. The analysis explores if and how those who ordinarily face stigmatisation, humanise the issue and offer a different perspective, compared to mainstream societal perspectives towards weight and obesity. A variety of different linguistic patterns are investigated, and the same linguistic frameworks and representation strategies introduced in chapters 4 and 5 are applied and discussed in this analysis to facilitate the comparison. Finally, within this chapter explorations into external factors such as capitalism and their level of influence in terms of which personal stories are published are carried out. This leads to questions surrounding the veracity of the ostensible agency given to individuals who have experienced obesity within these stories being asked and discussed. The seventh and final chapter in this thesis summarises and concludes all of the main findings. It details how each chapter fulfils the aims which have been introduced above, discussions about the extent to which the media perpetuate or challenge bias ideologies about weight are concluded and final arguments concerning language, weight and the media are made.

2. Literature Review

This chapter provides an overview of the existing research in the disciplines and fields with which this research relates. It is divided into eight sub-sections, the first of which outlines the field of Weight Bias as that is a recurring discussion in all three analysis chapters. The prolific nature of weight bias and weight discrimination makes people with obesity a marginalised social group. As such, the next section of the literature review focuses on research which has examined how marginalised groups are linguistically represented in newspapers. As obesity and weight are also situated within the fields of science and health, the linguistic representation of science and health in newspapers was also important to explore, and section 2.3 provides a review of some existing research in this area. Following this, the literature review zooms in to obesity specifically and section 2.4 provides an overview of research which has been carried out into the representation of weight and obesity in the media. The remaining sections feature research which is related to the focal aspects of the three separate analyses in this thesis. Section 2.5 explores how metaphors are used in newspapers, section 2.6 examines research which has investigated intertextuality in newspapers and section 2.7 focuses on personal stories in newspapers. The final section provides an overview of all the reviewed literature and provides commentary on how this thesis will contribute to the fields and disciplines discussed.

2.1 Weight Bias

Weight bias is defined as negative weight-related attitudes, beliefs, assumptions and judgments towards weight and can affect individuals of low as well as high weights (Alberga et al. 2016: 1). ‘In contemporary post-industrial societies the interpretation, evaluation, and management of body weight has become a highly contested social arena’ (Sobal 1999: 232). Over the course of the twentieth century, as societal emphasis on slimness has emerged, developed and increased, so has societal rejection of fatness (Sobal 1999: 233). This rejection

and bias towards weight can lead to discriminatory and stigmatising acts, from physical and verbal abuse to micro-aggressive acts such as eye-rolling and tutting (Myers and Rosen 1999; Lewis et al. 2011; Keith et al. 2017; Munro 2017). According to research, the predominant belief that obesity is attributable to personal responsibility and a lack of willpower significantly influences and predicts bias and stigma (Puhl et al. 2015: 1166). As a result of these beliefs, weight stigma is not subject to the social norms that condemn stigma surrounding other issues such as gender and race (Nolan and Eshlemen 2016: 15). Discrimination against people with obesity permeates many arenas of life, including work, family, health, and everyday interactions, leaving few environments and interpersonal relationships untouched by the phenomenon (Sobal 1999: 234; Munro 2017: 504).

2.1.1 Biased Ideologies

It can be argued that weight is one of the last socially acceptable forms of discrimination, ‘anecdotes abound about overweight individuals being ridiculed by teachers, physicians, and complete strangers in public settings, such as supermarkets, restaurants, and shopping areas’ (Puhl and Brownell 2001: 788). In addition, fat jokes and derogatory portrayals of people with obesity are prolific in popular media (see section 2.4). Common negative and inaccurate stereotypes surrounding obesity dictate that those with obesity are lazy, gluttonous and lack will-power (Puhl and Brownell 2001: 800). Studies have found that employers feel that their employees with obesity are lazier, less hardworking, have low supervisory potential and have poor personal hygiene and professional appearance (Decker 1987; Rothblum, Miller and Garbutt 1988; Klassen, Jasper and Harris 1993). These adverse and biased ideologies have also been documented amongst health care professionals. For example, previous research into biases held by physicians towards their patients has found that obesity is associated with poor hygiene, noncompliance, hostility, and dishonesty (Klein et al. 1982: 886). Fatphobic

ideologies have also been found in nurses, trainee nurses and dietitians in addition to doctors (Swift et al. 2013). In a study carried out by Maroney and Golub (1992) on nurses' (n= 174) attitudes towards patients with obesity, when asked whether they felt uncomfortable caring for patients with obesity, 48% agreed and when asked if they would prefer not to care for patients with obesity at all, 31% agreed (Maroney and Golub 1992: 389). Parallel results whereby health care professionals from a variety of different countries harbour negative weight-based ideologies such as these, have been found in multiple different studies (Bocquier et al. 2005; Sikorski et al. 2013; Phelan et al. 2014). Previous research has shown that negative weight-based ideologies are introduced and pervade social contexts and conversations from a young age. For example, weight-based peer discrimination has been found to be prevalent amongst adolescents in school (Juvonen et al. 2017), and children as young as three years old have been found to embrace biased ideologies towards weight (Cramer and Steinwert 1998). In addition to students, research carried out by Neumark-Sztainer, Story and Harris (1999) has revealed that teachers (n=115) believe students with obesity are untidy and less likely to succeed at work (Neumark-Sztainer, Story and Harris 1999: 6). In addition, 46% of their participants agreed that people with obesity are undesirable marriage partners for individuals of a lower weight, and 28% agreed that becoming obese is one of the worst things that could happen to a person (Neumark-Sztainer, Story and Harris 1999: 6). The results of these investigations indicate towards the prevalence of weight bias and highlight the wide range of social circumstances in which it can be found. Weight bias is not exclusive to the settings described in this section. For example, the media are prolific perpetrators of weight bias and a detailed review of the previous research into this specific phenomenon can be found in section 2.4.

In addition to the individuals and groups discussed above, people with obesity report to harbour biased ideologies towards themselves which mirror the predominant societal biases.

Ogden and Clementi (2010) carried out ethnographic research which analysed weight stigma and the extent to which it affects people with obesity (Ogden and Clementi 2010: 1). They interviewed 47 participants, all of which used language such as *ugly*, *freak*, *hate* and *disgust* to conceptualise themselves and their weight, 'I don't like looking at my body, when I look at it, I feel sick' (Ogden and Clementi 2010: 4). When asked about the psychological impact of their weight, participants utilised language such as *depressed*, *ashamed*, *hate* and *suicidal* (Ogden and Clementi 2010: 4). 'It's not guilt [...] It's more anger at myself. Anger, it's a sort of hate. It's anger at my inability to stop eating' (Ogden and Clementi 2010: 4). Finally, participants described feelings of disassociation, using words and phrases like *trapped*, *not me* and *does not belong to me* when discussing their bodies (Ogden and Clementi 2010: 4). These results demonstrate that biased ideologies towards weight are internalised by the individuals they target and can have adverse effects on self-perceptions and mental health. Corresponding results were found in Forbes and Donavon (2019), whose investigation of 147 individuals with obesity, led to the conclusion that the greater the exposure to weight bias and weight stigma, the more negative ideologies about weight are internalised (Forbes and Donavon 2019: 478). In addition, their results revealed internalised weight stigma had a direct effect on the psychological distress, body shame, and loneliness of their participants (Forbes and Donavon 2019: 478).

A brief review of the existing literature surrounding the nature of weight bias has demonstrated that in addition to the multiple systems of oppression which support and perpetuate it, there are multiple different ideologies incorporated into societies' aversion to fatness. As detailed above, people with obesity are considered lazy, less deserving of medical care, unintelligent, incompetent, unattractive and unsuitable romantic partners. As Ogden and Clementi (2010) and Forbes and Donavon (2019) argue, these ideologies are internalised and can significantly impact the mental and physical health of the individuals they target. In

addition to this, the perpetuation and dissemination of these negative ideologies can inspire stigmatising acts against people with obesity.

2.1.2 Stigmatising Acts

As discussed in section 2.1.1, the negative ideologies surrounding weight and people with obesity are diverse and wide ranging. These biased ideologies do not just result in disdain towards individuals with obesity, they can result in the physical, verbal and micro-aggressive abuse of individuals with obesity. Participants in studies which have investigated the nature of weight stigma have reported ‘being hit, beaten up, or physically attacked because of their weight’ (Myers and Rosen 1999: 224). In addition to physical aggression, micro-aggressive acts are a prevalent aspect of the stigmatisation of weight. Micro-aggressions refer to intentional and unintentional, small but commonplace behavioural, verbal and environmental indignities which communicate hostile and derogatory slights and insults towards those they target (Derald-Wing et al. 2007: 271). Examples of micro-aggressions towards people with obesity can include, eye rolling, tutting, dirty and judgemental looks, a health care professional suggesting a diet to a patient when the patient came in for a concern unrelated to weight and appearance-related compliments such as ‘you’ve lost weight...you look great!’ (Tylka et al 2014: 5; Munro 2017: 5050). In addition, derogatory verbal taunts about weight are prolific and are reported as being the most frequent and most severe type of stigmatisation experienced by people with obesity (Myers and Rosen 1999: 224; Puhl et al. 2008: 351). Ethnographic research into this specific issue has demonstrated that verbal abuse can manifest itself in two different ways, direct and indirect (Lewis et al. 2011: 1349). Direct verbal abuse refers to abusive and negative comments made directly to an individual. These slights and comments are not always as overt as name calling. Many participants in Lewis et al.’s (2011) study described how their weight was used by others to question their broader

societal roles and abilities. 'For example, one participant who was training to be a doctor was told repeatedly by friends and family members that she should lose weight, or she would not be respected by her patients' (Lewis et al. 2011: 1352). Another female participant described a confronting experience when her ability to be a mother was questioned:

'I had a miscarriage and I told someone, and they said to me just in the middle of the street, 'oh, well it was probably all for the best'. And I said, 'Why?' And they said, 'Well you wouldn't want to have a child when you're that weight.' I was just devastated.'

(Lewis et al. 2011: 1352)

Indirect verbal abuse refers to situations in which individuals are the target of negative and abusive commentary, but this commentary is made around them whilst they are in ear-shot, as opposed to a direct verbal affront. This type of verbal abuse is reportedly harder to challenge.

For example:

'You walk down the street and kids all go 'look at that fat lady, mum', and the parent will usually look and go 'yeah, that's what happens when you eat too much. Or you'll be sitting somewhere in a restaurant and someone will say 'I bet you they are going to eat two meals.''

(Lewis et al. 2011: 1352)

These examples demonstrate the wide variety of biased ideologies which exist around weight and they highlight the sometimes-implicit nature of stigmatisation, particularly in regard to the language used in verbal abuse. In the examples given, none of the language, aside from a child calling a lady 'fat', is overtly vitriolic or stigmatising. It is the implications of the seemingly neutral language which perpetuate biased ideologies, such as women with obesity are not equipped for motherhood and people with obesity are greedy and make less competent doctors, which make the statements stigmatising. Verbal abuse is the most

common form of weight stigma, yet in the existing studies which have investigated weight stigma, language itself is not a focal point of the analysis. By analysing their results, it can be determined that the implicit nature of the discrimination documented, from a linguistic perspective, is an important factor to consider moving forward with this research. In addition, it is clear that an analysis and discussion surrounding the implicit nature of stigmatising language and ideals will add to and complement the field of research which currently exists around weight stigma.

2.1.3 Effects of Weight Bias and Stigma

Weight bias, and the role language plays in perpetuating it, is an important subject of research. As detailed in the previous section, language is a primary method through which weight discrimination is accomplished. In addition to the clear social injustice which results from weight bias and discrimination, the psychological, physiological and social effects of those targeted and discriminated against can be detrimental. There are various different social perpetrators of weight stigma, with friends and family members reported as being one of the most prevalent (Puhl et al. 2008: 347), and due to the numerous social contexts in which weight stigma can and does occur, the effects it can have on an individual's social life and interpersonal relationships can be extensive. Research has provided empirical evidence detailing how weight discrimination strains relationships and how this transcends into their social lives. A participant in Ogden and Cleminti's (2010) study details the social dynamic between her and her ex-partner, 'Sue described how she had been rejected in the past: "He didn't want to be seen with me... nobody wants to take me anywhere and it hurts...I don't want a relationship now because I don't want to be hurt' (Ogden and Clementi 2010: 7). This example demonstrates how emotional and social effects of weight bias and stigma intersect as this participant is now actively avoiding pursuits of romantic relationships in an effort to

avoid emotional turmoil. The avoidance of social relationships and situations through fear of stigmatisation is a commonly reported phenomenon. Individuals have reported engaging in selective social isolation, which refers to avoiding social situations to remain unnoticed through fear of being stigmatised. For example, Epiphaniou and Ogden's (2010) research into the experience of people with obesity detail in their results how 'most participants described avoiding social interactions when they were overweight either finding excuses not to go out or choosing to remain unnoticed when participating in social gatherings' (Epiphaniou and Ogden 2010: 890). Building on this, some also described 'trying to hide in a dark corner' or 'trying to remain unnoticed' when they did go out (Epiphaniou and Ogden 2010: 890). The psychological impact of the pervasive negative ideologies surrounding weight, facing stigma and fear of stigma are extensive. These phenomena are significant and independent contributors to poor emotional and physical health (Puhl, Himmelstein and Quinn 2018: 167). The adverse psychological outcomes caused by weight bias and stigma include, depression, anxiety, stress and low self-esteem (Carles et al. 2013; Durso, Latner and Ciao 2016; Puhl, Himmelstein and Quinn 2018). In addition, research has provided evidence for a multitude of adverse physical and physiological effects including restrictive and disordered eating patterns, binge eating and metabolic syndrome, beyond the effect of BMI (O'Brien et al. 2016, Palmeira, Pinto-Gouveia and Cunha 2016; Pearl et al. 2017). Metabolic syndrome 'refers to a cluster of risk factors for cardiovascular disease and type 2 diabetes' (Pearl et al. 2017: 318), diseases which are commonly attributed to obesity. The relationship between weight stigma and metabolic variables such as blood pressure and insulin levels is explored and discussed in depth in sections 5.4.1 and 5.4.2 below. In addition, the existing literature surrounding the effects of weight stigma has found that weight stigma is significantly associated with all measures of disordered eating which can include, binge eating, emotional eating and restrictive eating, weight cycling and eating anxiety, which refers to anxiety

around eating in front of others through fear of ridicule (O'Brien et al. 2016: 74-75). Many of these patterns of disordered eating (weight cycling in particular) also positively correlate with metabolic syndrome and this relationship is also discussed further in sections 5.4.1 and 5.4.2. Finally, there are multiple studies demonstrating that weight stigma, particularly internalised stigma, can lead to suicidal ideations and acts in some individuals (Ogden and Clementi 2010; Levy and Pilver 2012; Jun Ju et al. 2016). Therefore, the effects of weight bias and stigma serve as further justification for the importance and value of this research.

Stigmatising acts are caused by biased ideologies, and as discussed, language is the primary vessel through which these negative ideologies are disseminated. The effects of weight stigma, as detailed in this section are significant and can be detrimental socially, psychologically and physiologically. Further understanding of how language is overtly used and also manipulated to implicitly enforce discriminatory ideologies has the potential to be used in weight stigma reduction efforts and has the potential to further advance the Fat Acceptance movement.

2.1.4 Fat Acceptance Movement

The Fat Acceptance movement began in the late 1960's and 'focuses on advocating for fat people who are stigmatised and discriminated against' (Sobal 1999: 233). In terms of the language surrounding weight, 'many movement participants use the term *fat* to describe themselves in an attempt to reclaim the term and neutralise its negative connotations' (Sobal 1999: 233). The term *fat* has been and will continue to be utilised throughout this thesis in the same vein, a neutral descriptor, as opposed to a derogatory slur. Fat acceptance arose from the variety of social movements materialising such as African American civil rights, women's liberation and gay rights, and the consciousness these movements raised about inequality, stigmatisation and discrimination (Freeman 1983; Sobal 1999: 234). In 1969 the

National Association to Advance Fat Acceptance (NAAFA), an American non-profit, civil rights organisation dedicated to protecting the rights and improving the lives of fat people was founded (NAAFA 2020). As an organisation they advocate for issues such as the introduction of size-related legislation, such as protection from stigmatisation in health care settings and in the workplace, tighter regulations surrounding harmful weight loss drugs, tighter regulations surrounding misleading diet advertisements and less stigmatising portrayals of weight and fat people in the media (NAAFA official policies 2020). Although the progress with policies such as these has been slow, some British and global organisations have adopted some of NAAFA's proposals. For example, The World Obesity Federation, The British Obesity Society and HOOP (Helping Overcome Obesity Problems) UK, all advocate for less stigmatising media portrayals of obesity. However, despite their efforts, as the results of this research will reveal, the portrayal of weight and obesity in British media is still harmful, inaccurate and stigmatising. Rigorous linguistic analysis of media representations of obesity could be utilised to advance these efforts, providing further evidence for the pertinence of this research.

Fat Acceptance and fat activism takes many different shapes and extends beyond these organisations. 'The internet has become a central organising place for fat activism with the range of blogs devoted to the subject being referred to colloquially as the *fatosphere*' (Meleo-Erwin 2011: 192). The *fatosphere* is an online network of Fat Acceptance blogs and a virtual public space where fat activists, through their writing, try to renegotiate the boundaries of fat embodiment, discuss and deconstruct standard discourse around obesity, relate national and international news items concerning obesity, share resources, their stories and their lived experience of fatness and the oppression they have faced (Meleo-Erwin 2011: 192; Afful and Ricciardelli 2015: 458). In addition, in the nutrition and eating disorder fields, there are emerging weight-inclusive and non-diet approaches to health being developed and put into

practice. Weight-inclusive approaches to health do not place emphasis on weight loss and instead ‘rest on the assumption that everybody is capable of achieving health and well-being independent of weight if given access to non-stigmatising health care’ (Tylka et al. 2014: 5). Weight-Inclusive approaches to health reject BMI as an indicator of health and under this paradigm, weight is not a focal point for medical treatment and intervention (Tylka et al. 2014: 5). Approaches to health such as these include models such as Health at Every Size and Intuitive Eating. These models are practised by many nutritionists and eating disorder specialists in Britain and advocate healthy diets, health-sustaining physical activity and honouring hunger cues, but are weight neutral (Bombak 2014: e64).

The pervasive societal ideology which equates thinness to health, virtue and beauty is being increasingly questioned and rejected through this Fat Acceptance movement and its varying sectors. Despite the great advances made by these groups, obesity and weight are still among the most stigmatised characteristics in society (Puhl and Heuer 2010: 1019). As detailed throughout this section, language, weight bias and weight stigma distinctly intersect, yet the body of research which focuses on this intersection is small (additionally see section 2.4).

Researching weight bias from a linguistic perspective will contribute towards filling this gap; it will complement the research which currently exists and has the potential to be utilised to further empower and advance the growing anti-weight bias and Fat Acceptance movements.

2.2 Representation of Marginalised Groups in Media Discourse

As detailed in the previous sections, people with obesity are a marginalised group within society. The press representation of marginalised groups has been analysed by many researchers whose results display patterns of similarity, even across different marginalised groups. Fowler (1991: 92) argues that the press organise the world into cultural categories and place individuals and social groups within them. He states that these categories undergo

an ideological process of frequent repetition until they are naturalised and hardened into stereotypes (Fowler 1991: 92). Stereotypical categorisations, Fowler argues, are the discursive basis for discrimination (Fowler 1991: 93). In accordance with this, Baker (2005: 61) argues that newspaper reporting has a cumulative effect. The frequent nature with which newspaper articles are published and purchased means that if ‘similar sentiments appear on a regular basis, then the discourse will become more powerful, penetrating into society’s subconscious as the given way of thinking’ (Baker 2005: 61). The power of repetitive messages delivered implicitly through subtle linguistic patterns is highlighted in Baker’s (2005) analysis of the representation of gay men and the gay identity in *The Daily Mail* and *The Mirror*. The data analysed in this investigation consisted of 3000 articles published between January 1st 2001 and December 31st 2002, all containing the lexical items *gay(s)* and *homosexual(s)* (Baker 2005: 64). The analysis began with a collocation analysis, an analysis which identifies frequent and statistically significant co-occurring words (5L, 5R) of the lexical items, *gay(s)* and *homosexual(s)*, which found that the conjunction *and* was among the most frequent collocates of both *gay(s)* and *homosexual(s)* (Baker 2005: 67). When analysed further, it appeared that *and* was being used to connect homosexuality to other minority groups including other sexual and gendered identities such as *lesbian*, *bisexual* and *transgender* communities (Baker 2005: 70). In addition, homosexuality was also connected to other social groups including, unmarried people or people who have sex but are not married to each other, referred to using terms including, ‘*adulterers*, *cohabitees*, *unmarried couples*, *unmarried mums*, *single mums* and *divorcees*’, ethnic minority groups such as, ‘*Arabs*, *Asians*, *blacks*, *ethnic minorities*, *immigrants*, *Jews*, *Muslims*’, criminal identities, ‘*criminals*, *drug users*, *Nazis* and *prostitutes*’ and finally those connected to politics, ‘*civil liberty activists*, *feminists*, *liberals*, *social workers*, *trade unions*’ (Baker 2005: 70). The commonalities between all of these groups are their minority status and their perceived

‘problematic’ status within society. Baker’s results demonstrate how homosexuality is worked into a discourse of collective negative minorities, for example, an extract from his data read:

‘They – as we disclose today – are plotting to cull plummy white males from the Parliamentary candidates’ list, and replace them with pastel-suited *women*, *members of ethnic minorities* and *declared homosexuals*’

(Baker 2005: 71).

In addition, the collocation analysis also revealed links between transiency and gay relationships. Lexical items such as, *casual*, *experiment*, *fling(s)*, *romp(s)*, *frolics* and *adventures* being amongst the most frequent R1 and L1 collocates of *gay(s)* and *homosexual(s)* (Baker 2005: 72). Baker also draws attention to the fact that the plurality of many of the collocates creates the implication that gay men do not have single affairs but multiple (Baker 2005: 72). Having multiple affairs is an action which, in the West, is largely societally condemned. Further reinforcing the notion of impermanence and frivolous sex, as opposed to commitment and stability in terms of romantic relationships is the use of the lexical item *lover*, which is used to reference gay romantic relationships 99% more frequently than heterosexual romantic relationships (Baker 2005: 73). Finally, ‘related to the discourse of gay transient relationships is one which attempts to frame homosexuality as a (sexual) behaviour, rather than an identity’ (Baker 2005: 73). This is evident through lexical items including *tendencies*, *experiences*, *proclivities*, *tastes* and *feelings* collocating with *gay(s)* and *homosexual(s)* (Baker 2005: 74). Baker argues the implications of these labels diminish the gay identity and attach a negative representation to it. For example, the lexical item *tendencies*,

‘collocates strongly with the following other words in the British National Corpus: *suicidal, depressive, antisocial, aggressive, violent, criminal* and *dangerous*. Tendencies are clearly not a good thing to have’

(Baker 2005: 74).

The results of Baker’s investigation reveal that in his data sample, negative discourses are accessed to represent gay people and ‘homosexuality is constructed in complex ways that are frequently ambivalent and often insensitive’ (Baker 2005: 92). In addition, the results highlight how language can implicitly but effectively discriminate against a social group. Referring back to section 2.1.2, it is discussed how a commonality in verbal acts of weight stigma is the lack of overtly vitriolic language but the prevalence of negative implications. People with obesity’s roles in society such as their ability to parent are questioned and denigrated. Baker’s results reveal the same pattern, where through language which can appear unbiased without further analysis, gay men are portrayed as promiscuous, gay relationships are portrayed as impermanent and the gay identity is undermined.

A negative and misrepresentative news media narrative is not just exclusive to gay men. The LGBTQ+ community as a whole are also targeted and implicitly discriminated against in news discourse. Evidence of this can be found in the results of Turner et al.’s (2018) research focussing on the representation of same-sex marriage legislation in UK national newspapers. Their data was comprised of 2599 texts, 1,327,817 words and consisted of articles published ‘from the government’s announcement of the same-sex marriage consultation in September 2011 to the occurrence of the first same-sex marriages in April 2013’ (Turner et al. 2018: 184). Their results included lexical items which were also subtle in their negative implications towards same-sex marriage such as *controversial*, an adjective frequently (n=185) used to describe the same-sex marriage bill. For example, an article published in the *Mail Online*, 26th January 2013 included the comment, ‘MPs are expected to debate the

controversial Bill next month’ (Turner et al. 2018: 187). Turner et al. argue that *controversial* ‘is a word that indicates both significance and potential disagreement or tension and could suggest implicit opposition to the issue at hand’ (Turner et al. 2018: 187). This opposition is further reinforced through the use of additional adjectives describing the bill such as *divisive* (n= 92) and *contentious* (n= 48), suggesting that, in addition to being controversial, same-sex marriage debates actively create social division (Turner et al. 2018: 188). In addition to this, an interesting result from their analysis was the use of the adjective *ordinary* (n= 130) when referring to those opposed to or unaffected by same-sex marriage legislation, meaning heterosexual individuals and couples. The semantic connotations of this adjective carry significant rhetorical weight as the resulting implication is that same-sex relationships are extraordinary and abnormal (Turner et al. 2018: 190). An example of *ordinary* in use from their data includes an extract from *The Telegraph*, 8th January 2013, ‘*ordinary* people want him to stop meddling with the institution of marriage and get on with fixing Britain’s flatlining economy’ (Turner et al. 2018: 189). In addition to distinguishing those in same-sex relationships as unordinary, Turner et al. argue that heterosexuality is portrayed as synonymous with *ordinary* in examples such as this from *The Telegraph*, 3rd February 2013, ‘The extent of national opposition to redefining marriage is becoming apparent. *Ordinary* men and women do not want to see the destruction of the concept in law of mother and father [...]’ (Turner et al. 2018: 189). Press guidelines dictate that newspapers cannot discriminate based on sexuality (Turner et al. 2018: 185), and these results demonstrate how this guideline is circumvented by implicitly inciting homophobia through a variety of seemingly neutral adjectives. This accords with the results found in Baker (2005) where explicit homophobia is not expressed through the linguistic patterns found, but the implications created from these patterns are inherently homophobic and discriminatory.

In addition to the LGBTQ+ community, many linguistic analyses have found news discourses which are biased against and undermine other marginalised groups in society such as refugees, asylum seekers, immigrants and migrants. The research discussed so far has demonstrated that multiple linguistic constructions can deliver the same message. It is argued that the implications and propositions within a text are more likely to be stored in audiences' long term memories than the specific lexical collocations and linguistic patterns which deliver them (Clark and Clark 1977: 135; Baker et al. 2008: 21-22). Therefore, linguistic analyses into the representation of marginalised groups in society such as refugees, asylum seekers, immigrants and migrants have investigated the themes and topics introduced by the prevalent linguistic constructions as this can affect the 'discourse prosody' of these groups. The term 'discourse prosody' refers to attitudes and ideologies, often hidden, which can be revealed as a result of analysing collocation patterns between words and sets of words (Baker, Hardie and McEnery 2006: 58-9). For example, using the same corpus in both analyses, Baker and Gabrielatos (2008) and Baker et al. (2008) examined the representation of refugees, migrants, asylum seekers and immigrants (RASIM) in British newspapers. Their results revealed that the consistent collocates of RASIM included lexical items such as *flooding, enter, illegal, benefits, claiming* and *detained* (Baker and Gabrielatos 2008: 22). Baker et al. (2008: 286) grouped all of the collocates into the following categories of reference: *destination, number, entry, economic problem, residence, return, legality* and *plight*. These categories, particularly those concerned with entry, economic problems and legality were regularly used in ways which negatively referenced RASIM (Baker et al. 2008: 286). Examples from their data include, 'Britain was warned last night it faces a *massive benefits bill to pay* for the looming influx of *immigrants*' and 'Calais is still crawling with *asylum seekers trying to break into Britain*.' In addition, their results revealed that the individual groups within RASIM, particularly refugees, asylum seekers and immigrants were

treated as near synonyms within the corpus, and as such, they shared a large number of the categories of reference which denote a negative stance towards them (Baker et al. 2008: 288).

Therefore, the overall discourse prosody of RASIM was negative. Baker and Gabrielatos (2008) and Baker et al.'s (2008) studies demonstrate that when analysing media narratives surrounding a social group, the analysis must extend beyond the micro-linguistic elements such as the specific lexical patterns and collocations. As discussed, the implications of the collective prevalent linguistic patterns are more likely to be retained by audiences than the individual micro-linguistic features which comprise a text (Clark and Clark 1977: 135).

Therefore, analysing the themes in which these micro-linguistic elements shape and discussing the additional narratives introduced, such as economics and legality, can facilitate in forming comprehensive and systematic arguments concerning language, society and ideologies.

The drawing on additional narratives to advance negative representations of social groups has also been documented in news articles about women and people of colour. For example, Manning-Miller (1994) conducted an investigation into the representation of poverty and welfare in American news discourse. Her data consisted of articles from five major daily U.S. newspapers, *The Wall Street Journal*, *The Christian Science Monitor*, *The Los Angeles Times*, *The New York Times*, and *The Washington Post* (Manning-Miller 1994: 82). The articles under analysis were published within a five-year period between 1st January 1988 and 31st December 1992 (Manning-Miller 1994: 82). Her results reveal how the news articles in her data set used poverty and welfare as a tool in the politics of gender and race. Of the stories which contained statistics about poverty, 50% emphasised the number of women of colour in poverty by referring to facts and figures (Manning-Miller 1994: 84). In contrast, the poverty rates of white women were de-emphasised, with only 6.25% of the stories including these specific statistics within their stories (Manning-Miller 1994: 84). These figures contrast

sharply to actual percentages of women who were in poverty at the time in which these articles were published. For example, Manning-Miller details how, at the time of publication, ‘38% of women who received Aid to Families with Dependent Children were white, compared to 40% who were black, 16% Latino, 2.7% Asian, and 1.3% American Indian’ (Manning-Miller 1994: 84). Manning-Miller argues that reporting about welfare-reliant women of colour without complementary statistics of welfare-reliant white women misrepresents the issue of poverty and implicitly incorporates a false narrative of race (Manning-Miller 1994: 84). This false narrative perpetuates the stereotype that ‘makes poor women and people of colour appear consistently threatening and burdensome, demanding and undeserving of accommodation by government’ (Manning-Miller 1994: 84-5). Further perpetuating the unbalanced narrative was the fact that the newspapers also used over twice as many visuals of women of colour in poverty compared to white women in poverty (Manning-Miller 1994: 84). Out of the ten photographs used, seven of the photographs were of women of colour. Only three photographs were of white women, Manning-Miller arguing that ‘such visual choices further reinscribe images of the poor as women of colour’ (Manning-Miller 1994: 84). In this study, it is the intensification of certain facts and figures and the mitigation of others which propels the narrative within which a false correlation is created between poverty and race. Manning-Miller’s study is interesting and noteworthy as it highlights how discrimination can occur to differing degrees within sub-cultures of minority groups. Specifically, her results show how race is used as a method to further marginalise women and people living in poverty. Similar to Baker (2005) and Turner et al.’s (2018) results, the ideologies perpetuated in these articles are problematic and inaccurate, but the specific language used is not overtly stigmatising. It is the semantic connotations and the implications of the language and facts reported which create an erroneous and discriminatory representation.

The results discussed so far have highlighted how the implications of narratives and linguistic patterns in media discourse can create and perpetuate negative stereotypes about minority groups. This specific strategy of representation is prolific in the media representation of women and it is an area which has received much academic attention (Spender 1980; Baxter 2018). As detailed in Manning-Miller's (1994) analysis, women, particularly women of colour from an underprivileged socioeconomic background receive a negative press representation which is disproportionality and implicitly racially biased. In addition, in-depth linguistic research has also found that women are treated as subjects and disproportionately sexualised in news media compared to men (Byerly and Ross 2006: 37). Caldas-Coulthard and Moon (2010) conducted a study which investigated and compared the ways in which men and women are categorized in the written media, and thus the ways in which gender is constructed through lexical labelling. One specific focus of their analysis was the adjectival premodification of the gendered nouns *man* and *woman* in *The Sun*, *The Guardian*, *The Times* and *The Independent* (Caldas-Coulthard and Moon 2010: 109). They found that adjectives characterising physical appearance were used to a greater extent with *woman*, and of these adjectives, the ones pre-modifying *woman* were more sexualised than those pre-modifying *man* (Caldas-Coulthard and Moon 2010: 118). Caldas-Coulthard and Moon (2010: 118) argue that these characterisations reproduce stereotypical and wide-spread societal tropes associated with femininity which prioritise a woman's appearance (Caldas-Coulthard and Moon 2010: 118). Beginning with *man*, adjectives which identified physical attributes included examples such as *big*, *tallest*, *bearded*, *sexiest*, *strongest*, *strapping*, *good-looking*, *handsome*, *dishy* (Caldas-Coulthard and Moon 2010: 113-114). To compare, adjectives which identified physical attributes of *woman* include examples such as, *busty*, *larger*, *topless*, *beautiful*, *pretty*, *sexiest*, *real*, *attractive*, *gorgeous*, *sexy*, *glamorous*, *desirable*, *flat-chested*, *voluptuous* and *alluring* (Caldas-Coulthard and Moon 2010: 116). Although there are some examples of

adjectives with sexualised semantic connotations pre-modifying *man*, such as *dishy* and *sexiest*, the adjectives signifying sexuality found in their investigation were disproportionately pre-modifying *woman* (Caldas-Coulthard and Moon 2010: 116). In addition, a point which Caldas-Coulthard and Moon (2010: 116) make is that the use of the adjective *real* when referencing a woman's appearance can create an inference, and reproduce the oppressive ideology that there is a right/wrong, real/fake way for a woman to look. Therefore, these results indicate that the adjectival representation of women and an individual woman in the media seems broadly consistent with the kinds of qualities which are desired in women under a hierarchical and patriarchal society; attractiveness (Caldas-Coulthard and Moon 2010: 118).

Even women who have power and are arguably situated higher in the social hierarchy are subject to discriminatory press representations. For example, research into the representation of female politicians in British news discourse has found that they are depicted 'through a number of stereotypical frameworks that involve physical appearance, emotional status, their family role as mothers or wives, or their association to the so-called 'women's issues' (Ma 2014: 182). For example, references such as *wife of* and *mother of* which label women as dependent on someone else and tethers them back to their family role can be found in abundance (Murray 2010: 14; Ma 2014: 182). Referencing female candidates in this manner re-attaches them to communal gender stereotypes, ensuring that the public are reminded that a female political leader is 'always a woman, sometimes a politician' (Ma 2014: 182). Baxter (2018) explored the extent to which constructions of previous British Prime Minister Theresa May are gendered, and how she is stereotyped and at times sexualised in newspapers (Baxter 2018: 2). Much of the previous research discussed in this section so far has effectively demonstrated how collocations can shape specific identities within discourse. In addition to collocations, Baxter provides compelling evidence and arguments which demonstrate how

specific references to individuals can also subtly perpetuate patriarchal gender norms. She gives examples from the *Daily Mail* wherein throughout the entirety of an article minus the first line, Theresa May is named and referred to as ‘Mrs. May’ (Baxter 2018: 39). In contrast, the previous Prime Minister, David Cameron, is frequently mentioned but not once called ‘Mr. Cameron’ in the article (Baxter 2018: 39). This referential inconsistency was also present when other male politicians were discussed in the article, ‘*Mrs. May* last night made the bombshell appointment of leading Brexiteer *Boris Johnson* to the Foreign Office’ (Baxter 2018: 41). Baxter argues that the title *Mrs* carries ideological significance because historically, it semantically declares that the woman in question is married, and the wife and possession of her husband (Baxter 2018: 39). Therefore, the repeated use of the term *Mrs. May* throughout the article ‘suggests that Theresa May is primarily a wife and that her actions in the role of Prime Minister may be at odds with her normative gender identity’ (Baxter 2018: 39). Like many of the results discussed previously, this linguistic pattern is not overtly discriminatory, but its implications can be effectively undermining and stigmatising. In addition, female politician’s bodies are often commodified, fetishized and sexualised in the media, the persistence and regularity of which, provides easy passage into everyday discourse (Byerly and Ross 2006: 37). As well as references which foregrounded Theresa May’s gender, Baxter (2018) also highlighted how Theresa May was sexualised in *The Sunday Times* through the use of metaphor. The extract reads,

‘May was even more brutal than Harold Macmillan’s *night of the long knives*. He sacked seven of his Cabinet ministers on July 13th 1962, 54 years to this day. May’s *day of the long stilettos* distanced her socially from what has gone before’

(Baxter 2018: 77).

Stilettos are an alluring and glamorous, typically feminine footwear, whose reference unnecessarily centres Theresa May's gender. In addition, Baxter argues that the sexualising of May's action by means of comparison with a corresponding male Prime Minister further undermines Theresa May's political identity (Baxter 2018: 77). In addition to Theresa May, Vice Presidential Candidate Sarah Palin's *sexiness* was often at the forefront of her media attention, with her beauty pageant past often used to dismiss her as a serious candidate (Carlin and Winfrey 2009: 330). For example, she was often referred to as a *former beauty contestant*, *Caribou Barbie* and *Valentino Barbie* as opposed to the incumbent Governor of Alaska or Governor Palin (Carlin and Winfrey 2009: 330).

The disproportionate importance placed on the appearance of women within society relates to this research as cultural norms dictate that in order for women to be considered beautiful, they must be thin (Gill 2009: 95). Therefore, women who do not subscribe to societal ideals of femininity and thinness are chastised and shamed. For example, Hillary Clinton's appearance was viewed as not feminine enough in pantsuits that covered her 'cankles' and 'bottom heavy figure' (Carlin and Winfrey 2009: 330-31). The body shaming experienced by women in news media relates to this research as weight and obesity are a central factor. Therefore, the extent to which body weight is scrutinised and the grounds on which it is scrutinised are factors which will be considered in this investigation. The effect that appearance-based scrutiny in the media has on audiences, particularly female audiences can reportedly be detrimental. As discussed in section 2.1.3, the psychological and physical effects of weight stigma can be serious and life-threatening in some circumstances. Research examining the extent to which media portrayals of women affect audiences report similar findings to the research cited in section 2.1.3. Exposure to the 'thin-ideal' in the media has been found to negatively affect the body satisfaction and self-esteem of women (Lew et al. 2007: 543; Harper and Tiggemann 2008: 649). Harrison and Cantor (1997) also found that

the consumption of media which objectified women predicted a drive for thinness and body dissatisfaction (Harrison and Cantor 1997: 40). Furthering this, their results also found that the body dissatisfaction predicated by the media positively correlated to disordered-eating symptomatology in their participants (Harrison and Cantor 1997: 40). Wiseman et al. (1992) also found these results and posit that eating disorders are rising due to the increase in weight loss and diet-centric articles in the media, which largely target women (Wiseman et al. 1992: 85).

Overall, the studies discussed in this section have demonstrated that the discrimination of marginalised groups in news media is largely implicit. Seemingly neutral lexical collocates like *gay lover* or *ordinary couples* are undermining towards gay relationships and have homophobic connotations. In addition, seemingly neutral labels and references like *Mrs*, when used at disproportionate frequency can undermine female politicians and has sexist connotations. The themes and categories of reference introduced by prevalent collocate pairs, as detailed in Baker and Gabrielatos (2008) and Baker et al. (2008), can also significantly contribute towards positive and/or negative representations. These themes and categories of reference embody multiple prevalent linguistic patterns, are more frequent and therefore, more likely to imprint and impact audiences (Clark and Clark 1977: 135). In addition to analysing the pervasive linguistic elements within the corpus, Manning-Miller's (1994) research demonstrated that analysing the mitigated elements can expand and further arguments about how news discourse is or is not discriminatory. Her research also highlights how the addition of a contextual analysis complements a linguistic analysis as it can provide more evidence and strengthen arguments made from linguistic results. All of these aspects will be considered and incorporated into this research. People with obesity are a marginalised social group whose media representation has not inspired an abundance of linguistic focused academic research (see section 2.4). Therefore, this research will add to the existing research

on the linguistic representation of marginalised groups in news discourse in addition to adding an important and unique contribution to the weight bias and weight stigma field.

2.3 Science and Health in News Discourse

Obesity is an issue which relates to science and health, as well as humanity. Therefore, common patterns within the reporting of science and health issues is also an important field of research to explore. Turney (1996: 1087) argues that it is important for scientific research to exist outside the context of academia and that educating the public around scientific issues can have economic, political, social and cultural benefits. He maintains this is because it ‘can be a major element in promoting national prosperity, in raising the quality of public and private decision-making and in enriching the life of the individual’ (Turney 1996: 1087). Despite this, a large majority of the general public have a sufficient knowledge deficit regarding issues relating to science and health (Bauer 2009: 223) and the knowledge they do possess is largely predicated on the news media representation of such issues (Clarke et al. 2003; Cooper et al. 2011). Bauer (2009: 223) argues that ‘the battle for the public mind has become the battle for the public heart’ and news reports on issues relating to science and health often undergo a process of embellishment in an effort to create newsworthy articles and facilitate sales. A field of science and health which attracts a large amount of media attention and has inspired much linguistic research is epidemics. This specific field is reviewed at length in section 2.5.

Climate change is also a science-based issue which attracts much media attention. Bell (1994) conducted a study into the New Zealand news media representation of climate change and found an abundance of exaggerated but reductive inaccuracies. Global environmental issues are among the most serious issues facing society, and while the seriousness of the issue is intensified in Bell’s (1994) results, crucial facts and arguments are mitigated, resulting in misinformation (Bell 1994: 33). Bell analysed 360 news stories all covering the subject of

climate change and all published within a six-month period from 15th March to 14th September 1988 (Bell 1994: 40). His results demonstrated that figures which, within the scientific community were used as ‘what-if assumptions in order to calculate possible effects’, were reproduced within his media discourse data in the form of predictions and firm expectations (Bell 1994: 42). This was linguistically realised through what Bell describes as the ‘illocutionary force of the statement’, through semantically strong verbs such as *will*, *predict* and *expect* (Bell 1994: 42). Bell found this to be the case in one third of the media discussions surrounding rises in the earth’s temperature and half of the discussions surrounding sea level risings (Bell 1994: 42). In addition to embellishment, Bell found that fundamental scientific facts and information were omitted from the news media narrative, for example, the time frames within which the earth’s temperature and sea levels were predicted to rise (Bell 1994: 43).

‘In cases in our news sample, huge sea levels were mentioned – 30 metres and 60 metres – as the possible outcome if polar icecaps melted, without mention that this would take hundreds of years. Such omission of time scope is probably understood by the public to mean the events will occur within the foreseeable span such as a lifetime’

(Bell 1994: 43).

In addition to omission of facts, confusion between facts and the ‘blending’ of separate, largely distinct phenomena such as ozone depletion and the greenhouse effect was the other main issue in the media discourse under analysis (Bell 1994: 47). Ozone depletion and greenhouse gasses ‘occur at different levels of the atmosphere, the processes by which they operate are different, and their effects are largely different’ (Bell 1994: 47). An example from Bell’s results where the media presented the two as one phenomenon is,

‘Service scientist from Wellington Thom Clarkson, said the fluorocarbons from aerosols and refrigerator units were *warming the earth's temperature* at an alarming rate and *destroying the protective ozone layer*’

(Bell 1994: 48).

The use of quotes from scientists and experts is common in media reports about science and medicine and a review of research into this specific phenomenon can be found in section 2.6. In terms of the misinformation created by fact omission and confusion, in addition to analysing news articles, Bell engaged with members of the public through questionnaires to determine if the misinformation found in the news media was paralleled in the public’s understanding of climate change. Fifty-two out of the 58 participants blended ozone depletion and the greenhouse effect in some way (Bell 1994: 55). The same result was found with rising sea levels, whereby participants made overestimations parallel to and beyond those found in Bell’s newspaper data regarding the rate at which sea levels are rising (Bell 1994: 54). The results of Bell’s research are interesting as the seriousness of climate change is not minimized in the news articles he analyses, it is amplified. As climate change is a serious issue, it can be argued that the intensification it undergoes in these articles does not require scrutiny. However, Bell argues that misunderstanding the issue of climate change and the causes of the greenhouse effect is socially and politically disabling (Bell 1994: 60). This is because it misleads people away from recognizing, facing and dealing with the real causes and effects of a global environmental problem (Bell 1994: 60). Therefore, this misunderstanding can affect the way the audience interact with the world and vote in political races which could negatively impact climate change (Bell 1994: 60).

The issues of climate change and obesity have several synonymous elements. There is a scientific basis to both, an inherent but additionally socially constructed link to human behaviour and both feature within discourses of fear and death (also see section 2.4). Höijer

(2010: 721) argues that the media play a crucial role in the culture of fear through daily scare stories focusing on new threats and risks. She carried out a qualitative study into how Swedish media socially construct or represent global climate change, with a focus on how emotions of fear, hope, guilt, compassion and nostalgia are inscribed into the verbal representations (Höijer 2010: 718). Fear, Höijer highlights, is perpetuated through headlines containing semantically charged nouns such as ‘Climate *Crisis*’ Climate *Catastrophe*’ and ‘Climate *Threat*’ (Höijer 2010: 721). In addition, similar to the studies discussed in section 2.2, Höijer explores the topics discussed in relation to climate change and found that, the fear introduced by the headlines was reinforced through discussions surrounding effects of climate change such as animal extinction (Höijer 2010: 721). Höijer gives the example, ‘The heat is making *animals extinct*. Rising temperatures *threaten the animal life* of the whole planet.’ (Höijer 2010: 721). Höijer also detailed how the article which followed this had the subtitle ‘mass extinction’, and in a number of separate summaries about *threatened animals* fear-related wordings were used, such as *seriously threatened* and *at risk of extinction* (Höijer 2010: 722). Höijer argues that animals have an intrinsic value, the threat to which can be used to project on to the audience, a moral obligation to act and change their behaviour (Höijer 2010: 722). In addition to utilising fear evoking lexical items and incorporating wider narratives such as animal extinction, Höijer notes the use of metaphors within her corpus linking ‘our private existential fear of illness and death to climate change’ (Höijer 2010: 722). For example, alongside discussions of melting glaciers, dehydrated lakes and disappearing forests, Höijer notes statements such as, ‘data and satellite images of Earth reveal how *sick* our planet is’ (Höijer 2010: 722). Höijer and Bell’s analyses are parallel in the use of catastrophised language, but their results to this stage differ from those discussed in section 2.2, where the language utilised was ostensibly neutral, but carried negative implications. The results discussed in section 2.2 are analyses into the representation of different social groups.

Climate change is an issue, like obesity, which sits at the intersection of science and humanity. The results pertaining to climate change discussed so far have been about the generalised representation of climate change as an issue. When Höijer's analysis moves focus to the role of people within her media data, interestingly, the results did not display similarities to those discussed in section 2.2. When the articles analysed by Höijer address citizens who are not behaving in a climate friendly fashion, she found the language to still be blunt and explicit. Examples from her data include, 'we ourselves are the *guilty* ones, and only we can halt the process' and 'future generations will *curse* our *short-sighted greed* and *irresponsibility*, which *destroyed* the only Earth we have' (Höijer 2010: 724). In these examples, explicit blame is placed on society and there appears to be no effort to disguise ideologies behind seemingly neutral language, which was the strategy found in the studies discussed in section 2.2. It can be argued this could be because the individuals targeted in these articles, people who do not behave in a climate friendly fashion, are not members of a minority or marginalised group, meaning the legality surrounding how they are reported on is different. In addition, as climate change is an urgent issue, an additional argument can be made that the importance of expressing this urgency offsets the importance of politeness. When moving forward with this research, it will be interesting to note the parallels and differences with which the articles under analysis portray obesity and people with obesity compared to the way in which LGBTQ+ people, women, people of colour, and climate change are portrayed. Like climate change, there are narratives of urgency surrounding obesity, which could encourage explicit language like that seen in Höijer's research. However, the UK press standards state that 'The press must avoid prejudicial or pejorative reference to an individual's race, colour, gender, religion, sex, gender identity, sexual orientation or to any physical or mental illness or disability' (Independent Press Standards

Organisation). As weight and obesity are not legally protected characteristics, their press representation is an intriguing line of inquiry.

Climate change is one amongst many scientific issues discussed extensively by the media.

The concept of newsworthiness, a factor which contributes to what is reported and how it is reported, refers to news items which have some interest or importance to readers and can be made ‘sufficiently exciting’ Östgaard (1965: 50-51). Scientific issues which are unusual, controversial or directly affect the general public, like climate change and obesity are deemed newsworthy by the media (Stryker 2002: 521). It is because of this that discussions surrounding health, medicine and disease frequently occur in media discourse. A medical phenomenon which receives substantial press coverage is dementia. Kirkman (2006: 74) argues that media coverage ‘has the potential to reduce the stigma associated with dementia, but newspapers continue to incorporate conventional characteristics of dementia in their accounts.’ Kirkman’s research was a qualitative content analysis which focused on New Zealand’s print media representation of dementia. (Kirkman 2006: 75). Within her data there were two key frames used in reference to people with dementia, *social death* and *violence* (Kirkman 2006). In terms of social death, anecdotal reports about celebrities and antithetical descriptions such as ‘brilliance dimmed by disease’ and ‘the beginning of a writer’s sad final chapter’ were found in abundance (Kirkman 2006: 76). Kirkman focused on the latter example and argued that ‘while the heading commences with the word *beginning*, there is no doubt to the reader that this is in fact the end of a particular life, a writer’s life’ (Kirkman 2006: 76). Adding to the social death frame, stories of individuals becoming lost, wandering the streets and engaging in what would ordinarily be deemed socially questionable behaviour feature dominantly in the press representation of dementia (Kirkman 2006: 77). Kirkman makes the compelling argument that accounts such as these create a reductive representation of dementia and perpetuate false and negative stereotypes about individuals with dementia

(Kirkman 2006: 76). Finally, Kirkman found a multitude of stories detailing instances of violence from dementia patients. ‘Geriatric attacks terrorise staff’, ‘people don’t realise how aggressive some of these people are’, ‘violent old people have sparked calls for rest-home workers to be trained in self-defence’ (Kirkman 2006: 77). In accordance with her argument concerning the social death frame, Kirkman argues that the violence frame incites stigma towards people with dementia and perpetuates false and reductive stereotypes (Kirkman 2006: 77). In addition, her results demonstrate that overtly negative language such as *terrorise* and *aggressive* are used in reference to the individuals at the core of this issue, which accords with the results found in the climate change analyses. The idea of sensationalism was not explored in Kirkman’s paper, but it is clear from her results that the articles analysed capitalised on a small aspect of dementia and dramatised it to create newsworthy and lucrative stories. Peel (2014) conducted a similar study into the UK newspaper representation of dementia and found what she terms a ‘panic-blame framework’ (Peel 2014: 885). The exaggerated and simplistic reporting found in Kirkman’s research was mirrored in Peel’s investigation and comprised the panic aspect of Peel’s panic-blame framework. The blame aspect of the framework refers to preventative measures and treatment options discussed, and Peel found that the ‘discourse coheres around constructing dementia onset as a function of individual behaviour’ (Peel 2014: 893). ‘Worried you’ll get Alzheimer’s? Then follow these seven steps’, ‘Living a healthy lifestyle can halve your risk of Alzheimer’s’ (Peel 2014: 893). In addition, Peel noted the pervasive use of verbs such as *beat*, *save*, *prevent*, *reduce* and *avoid* used within this frame that ‘unambiguously present the onset of dementia as controllable through individual actions’ (Peel 2014: 895). Peel argues this frame creates an inaccurate representation of dementia because the disease has a multifactorial aetiology, one of the main drivers being age, yet lifestyle is the primary factor discussed within her data (Peel 2014: 893-5). Both the investigations into the media

representation of dementia discussed so far have results which display evidence of an inaccurate and stigmatising narrative. The intensification of certain facts and the mitigation of others perpetuates stereotypical characterisations of dementia and people with dementia. Lawless and Augoustinos (2017) carried out a linguistically driven analysis and explored how brain health messages are constructed in the Australian press over a five-year-period with a particular focus on the treatment and preventative advice given to readers (Lawless and Augoustinos 2017: 67). A primary result found in this investigation was the frequent occurrence of imperatives used to issue directives and health advice. An interesting linguistic component of these imperatives noted by Lawless and Augoustinos, was the journalists' use of modal auxiliaries, which they argued was a method of enforcing moral entitlement over the future actions of the readers (Lawless and Augoustinos 2017: 69). For example, 'millions of Australians *will* have dementia by 2050. Professor Hannan said that people *should* do everything they *could* to protect their brains' (Lawless and Augoustinos 2017: 69). They argue the epistemic modal verb *will* qualifies the force of the directive, and the modal verbs *should* and *could* semantically infer a moral obligation onto readers to 'protect the brain and show little orientation to recipients' capacity or willingness to comply with the advice' (Lawless and Augoustinos 2017: 69). Therefore, evidence of discourses surrounding morality and obligation are present in both climate change and dementia media narratives. In addition, Lawless and Augoustinos note that scientific opinion is frequently cited with the imperatives. Intertextuality was not a central focus of their study, but the authors do argue that expert opinion legitimises the moral obligation implicitly inferred within the health behaviour directives employed in their news data (Lawless and Augoustinos 2017: 70). The primary conclusion of their study was that within Australian newspapers, audiences are positioned as individually responsible for managing their brain health and preventing dementia (Lawless and Augoustinos 2017: 75). The pervasive use of modal auxiliaries 'not only specify the

possibility of an event occurring, but also audiences' moral obligation to engage in certain brain enhancement or dementia preventative practices' (Lawless and Augoustinos 2017:76). Lawless and Augoustinos argue that this frame and neoliberal approach to dementia could be problematic because it simplifies the issue and promotes a potentially repressive ethos of social control and risk-management in older age (Lawless and Augoustinos 2017: 76). There is a distinct pattern between the media representation of dementia and climate change which is that it is a sensationalised yet simplified representation. All studies discussed provide evidence in their results which demonstrate the selective nature in which the media reports on scientific phenomena. In addition, both types of research discuss and demonstrate how macro-features of discourse such as themes and prevalent topics can significantly contribute towards the representation of the issue and people under discussion.

A field of science which is closely related to the topic of this thesis is nutrition. Dietary advice can be found in abundance in news media discourse and according to Cooper et al. (2011: 664), the simplistic and contradictory nature of this advice contributes to public misconceptions around food and health. It is argued that the media presents a polarised view of 'good' versus 'bad' food and as a result, like with climate change and dementia, a large degree of morality is implicitly attached towards nutrition and health (Lupton and Chapman 1995: 478). In addition, it has been reported that news media thrive on controversy as it generates newsworthy stories (Östgaard 1965: 50-51). Therefore information, opinions and facts which contradict popular beliefs and notions are a principal component of news media discourse. Lupton and Chapman analysed the media representation of cholesterol, diets and lifestyle in Australian national newspaper articles published in an eight-month period between January and August 1993 (Lupton and Chapman 1995: 481). Their results revealed that controversial and contradictory scientific findings and opinions featured dominantly within the narrative (Lupton and Chapman 1995: 481). For example, 'margarine fuels heart

risk', 'chocolate bars may help to lower your cholesterol', 'a drink a day is good for the heart' (Lupton and Chapman 1995: 481). These claims contradict prevailing scientific evidence surrounding the consumption of fat and heart health and the effects of sugar and alcohol on health. Claims such as this were found to have been taken out of context and had little scientific evidence supporting them (Lupton and Chapman 1995: 481). Lupton and Chapman argue that while narratives such as these fulfil news values and facilitate sales, they result in a chaotic food paradox which misinforms the public and can foster confusion and anxiety around food and nutrition (Lupton and Chapman 1995: 482). Evidence of contradictory claims in the media regarding nutrition and health is not just confined to Lupton and Chapman's study. More recently Goldacre (2009) found similar results in British newspapers. For example, he discussed examples found in *The Daily Telegraph* in which a specific health reporter reported that red wine could be used to prevent breast cancer (Goldacre 2009: 848). This piece was based off a speculative study which investigated the 'effect of a molecule in grape skin on the activity of an enzyme involved in oestrogen metabolism' (Goldacre 2009: 848). In addition to presenting speculation as fact, this story was in direct conflict with a report the health reporter wrote three months prior claiming every extra unit of alcohol a day was associated with a 10% increase in breast cancer (Goldacre 2009: 848). Another noteworthy result found by Goldacre was *The Daily Mail's* catalogue of factors they claimed play a significant role in the causation and prevention of cancer. In the month of July 2009, *The Daily Mail* suggested that causes of cancer include 'divorce, wi-fi, toiletries, and coffee, while things suggested to prevent cancer are crusts, red pepper, liquorice and coffee' (Goldacre 2009: 848). Goldacre's results demonstrate the fickle nature of the press and he argues that in addition to misleading the public on specific issues, 'they also undermine the public's understanding of how we know if something is good for us, or bad for us' (Goldacre 2009: 848). This argument echoes Lupton and Chapman's argument

that inconsistencies caused by sensationalism regarding articles about health can create a 'chaotic food paradox' (Lupton and Chapman 1995: 482).

The evidence presented by these studies demonstrated three primary factors. The first is the exaggerated yet reductive way in which scientific issues and facts are reported. Obesity is a scientific issue, and this pattern will be explored in this research to explore if and by how much the public are misinformed about matters concerning weight and health. In addition, in contrast with the results in section 2.2, when discussing individuals at the core of urgent scientific issues, the language utilised remains overtly negative. As previous research suggests that discrimination against marginalised social groups in news discourse is carried out through implicit language, the specific strategies of representation used in the news media representation of obesity will be interesting to explore. Finally, the research surrounding diets and nutrition highlighted the fickle and contradictory nature of the statements made. This correlates with the exaggerated yet reductive statements and establishing whether this is a factor within the obesity media narrative will complement the existing research about science in the media.

2.4 Obesity in News Discourse

The media creates social phenomena and plays a vital role in society's understanding of them (Boero 2013: 371). In addition to this, as discussed in the previous section, it can be argued that news media emphasise and dramatise certain social phenomena to attract attention and facilitate their capital gain. (Saguy and Almeling 2008: 59). Lawrence (2004) analysed how obesity was framed in 136 articles published in *The New York Times* from selected years including 1985, 1990, 1996, 2000, 2001 and 2002 (Lawrence 2004: 61). Her data revealed three salient themes for the causes of obesity, behavioural, biological and systemic, with systemic and behavioural being the most prominent. The behavioural frame demonstrated similarities to the societal-biased ideologies which surround weight discussed in section

2.1.1, linking obesity to a lack of self-control, gluttony, parental negligence and an overall sense of personal responsibility (Lawrence 2004: 67). For example,

‘excess weight gain may, at its simplest reckoning, be the result of *eating more food than one burns off*, and therefore the means to *controlling body weight* will always be a variation on *decreasing caloric intake while increasing physical activity*.’

(Lawrence 2004: 62)

Within the systemic category, individual choice is placed within the larger context of environmental influences and policy choices (Lawrence 2004: 62). For example,

‘people tend to think of overweight and obesity as strictly a personal matter, but when there are no safe places for children to play, or for adults to walk, jog, or ride a bike, that’s a community responsibility.’

(Lawrence 2004: 67)

Lawrence’s study highlights how the collective media discourses surrounding obesity contribute towards three primary messages, or themes. This correlates with studies discussed previously, particularly research into the dementia media narrative, which argued that the predominant themes misrepresent and stigmatise dementia and people with dementia. It can be argued that the behavioural frame, one of the most predominant themes found in Lawrence’s research also misrepresents and stigmatises obesity as it parrots the biased and misrepresentative principles on which weight stigma is built (see sections 2.1.1 and 2.1.2). Lawrence’s research did not have a linguistic focus, so it was not possible to determine if the predominant linguistic patterns and assess the semantic implications. However, an interesting factor that Lawrence emphasised, which relates to Saguy’s and Almeling’s (2008) argument that newspapers emphasise and dramatise certain social phenomena, was that the increase in

systemic and behavioural themes correlated with social events outside the context of the news articles. For example, systemic themes were twice as prevalent in the 2002 data, directly after the first lawsuit was filed against fast food chains, claiming they were responsible for the obesity problem America was facing (Lawrence 2004: 61). Then, in 2003, after the fast food chain lawsuit stories had become obsolete, behavioural themes were once again the most prominent within Lawrence's data (Lawrence 2004: 66). This provides evidence that the intensification of certain factors, is present in the obesity media narrative as well. Rather than emphasising the most accurate or factual information, the newspaper articles examined in Lawrence's (2004) study embellished whichever aspects of obesity would attract the most attention at the time of publication. This result is not surprising; newspapers are an industry, a business with a significant place in the world's economic affairs (Fowler 1991: 20).

Therefore, in terms of story selection, it is understandable that newsworthiness will be a contributing factor in terms of the decision making. However, as a result of this, issues such as obesity can be misrepresented, causing the publication of inaccurate information and the perpetuation of stigmatising ideologies and stereotypes.

Utilising a corpus almost identical to Lawrence (2004), Boero (2007) analysed how obesity was framed as an *epidemic* in 751 articles published in the *New York Times* from 1990-2001 (Boero 2007: 40). She argued that the word *epidemic* was becoming an increasingly popular way to describe the prevalence of individuals that have obesity in America and explored how it was defined as a social problem in society (Boero 2007: 42). From the 751 articles which comprised her corpus, Boero primarily focused on a seven-article series called the 'Fat Epidemic' which was published in the Autumn of 2000. Her results revealed that in addition to obesity being described as an 'epidemic', it was discussed in terms of its cost, 'obesity costs the U.S. an estimated 69 million dollars annually' (Boero 2007: 46). Obesity is additionally portrayed as a chaotic phenomenon and described as a wide spreading disease:

‘Obesity has reached epidemic levels and no one knows what to do about it’, ‘obesity causes 318,000 excess deaths a year’, ‘obese people are fat and frantic’ (Boero 2007: 46). Finally, the articles propagated a ‘fear of fat’ by highlighting that ‘any one could be at risk’, ‘researchers warn that it takes just a tiny energy imbalance, a few more calories eaten than burned for pounds to creep on.’, ‘to gain 15 lbs in a year, you only have to have an imbalance of 150 calories per day’ (Boero 2007: 46-47). Language was not the focus of Boero’s study and therefore, there are no discussions surrounding the co-text of *obesity*, *obese* and *epidemic*. However, it is clear from the examples which she provides that there is some evidence of overtly stigmatising language used in reference to people with obesity such as *epidemic* and *fat and frantic*. Therefore, this suggests the obesity media narrative could also feature some of the language patterns found in the research into the climate change and dementia media narratives, whereby, in contrast to the research into media narratives surrounding other marginalised social groups, overtly stigmatising language is utilised. Corresponding with Lawrence (2004), Boero also reported that wider social contextual factors affected the content of the articles. However, her results differed in that she discovered the articles were hiding specific facts and events rather than highlighting them. In 1998 the American National Institute of Health lowered the BMI threshold for overweight from 27 to 25. Therefore, overnight, 50 million more Americans were now classed as overweight (Boero 2007: 48). The year 1998 also saw a spike in Boero’s data with as many as 42% of the articles within her corpus being printed after 1998. The rise in the number of people categorised as overweight was paralleled by a rise in the amount of media attention it received. Obesity was becoming an increasingly topical issue, yet there were only three references to the change in BMI threshold in Boero’s data (Boero 2007: 48). This fact, it is argued, was largely ignored to reinforce the ideologies of chaos and epidemic around obesity (Boero 2007: 48). The combined results of Lawrence (2004) and Boero (2007) provide

evidence and can be used to shape an argument that the media portrayal of obesity and people with obesity is largely negative and predicated on stories which will attract attention and facts. These stories have been contorted and recontextualised to support the underlying arguments and ideologies within the article. The results of Lawrence (2004) and Boreo's (2007) studies display interesting patterns. However, both analyses were qualitative in nature and therefore the size of their collective corpora is small and arguably unrepresentative of the wider discourse. The primary point of difference between these studies and this research here is the methodology. A combination of quantitative and qualitative approaches to research allows for a larger data set, similar to those discussed in section 2.2 such as Baker et al. (2008) and Turner et al. (2018). The ESRC Centre for Corpus Approaches to Social Science (CASS) is, at present conducting a large-scale analysis into the UK media representation of obesity (CASS 2020). This research has not been published but the methods employed are similar to methods used in this thesis, allowing for a large and representative data set (CASS 2020). Therefore, the combination of the research conducted by CASS and this research will propel the development of new and support the progression of existing arguments concerning language, weight and obesity.

A qualitative study carried out by Malterud and Ulriken (2010) on obesity representation in Norwegian newspapers was similar to Lawrence (2004) and Boero (2007) in that the data set was small and arguably unrepresentative. Yet, within the articles they examined, the results, like Lawrence (2004) and Boero (2007) also displayed evidence of weight stigma and misrepresentation. Malterud and Ulriken performed a content analysis on 82 articles about obesity published during a three-month period in 2007. Their results revealed a cultural message of blame and shame associated with people with obesity that extended beyond their weight (Malterud and Ulriken 2010: 47). The three main themes associated with obesity in their data were: unattractiveness, lack of self-control and a lack of success (Malterud and

Ulriken 2010: 47). Malterud and Ulriken shared some examples from their data. ‘40, fat and finished?’ was a reference made to a 40-year-old bike race competitor (Malterud and Ulriken 2010: 49). In addition, ‘we design ourselves by shaping our body. The slim, hard, and healthy reaps honour, because the body signals discipline and control. The fat and sloppy run the risk of shame’ was a comment made in one of their articles (Malterud and Ulriken 2010: 49). ‘We can all become beautiful and slim’ was a quote from a plastic surgeon that was relayed by one of the newspapers under examination (Malterud and Ulriken 2010: 49). Malterud and Ulriken argue that repeated exposure to these negative depictions of obesity can lead to the production and perpetuation of weight bias (Malterud and Ulriken 2010: 50). Personal blame themes in news articles about obesity were also documented in Atanasova and Koteyko’s (2017) analysis into British and German news articles. They analysed 768 articles and self-control was the most frequently used frame, occurring in 390 (50.8%) articles (Atanasova and Koteyko 2017: 659). Articles which engaged with this frame positioned weight as a core problem, and featured statements such as ‘the fat gene can be beaten ... in the gym’ (Atanasova and Koteyko 2017: 659). Weight was also problematised within this frame by discussing how ‘fat people burden the healthcare system’ (Atanasova and Koteyko 2017: 659). In addition, ‘discussions about the causal mechanisms of obesity focused on personal behaviour related to physical activity and food consumption’ (Atanasova and Koteyko 2017: 659). For example, news articles spoke of using food to ‘cope’ with problems’ (Atanasova and Koteyko 2017: 659). Like the studies discussed in this section so far, the focus of Malterud and Ulriken (2010) and Atanasova and Koteyko’s (2017) research was not language, but insights into the linguistic construction of obesity can be drawn from their examples. For example, overtly stigmatising language can be seen in Malterud and Ulriken’s (2010: 49) example ‘fat and *sloppy*’. In addition, Atanasova and Koteyko (2017: 659) highlight how people with obesity are described as a *burden* and referred to as *fat*. As

discussed in section 2.1.4, the Fat Acceptance movement are reclaiming the label *fat* and utilise it as a neutral descriptor. However, as detailed in Atanasova and Koteyko's (2017) analysis, this particular example was categorised into the *self-control* frame, indicating the label *fat* had discriminating as opposed to liberating intentions. The results of these studies demonstrate that overtly stigmatising language is used in reference to people with obesity which is a contrast to the results of previous research into the representation of other marginalised groups discussed in section 2.2. A result from Atanasova and Koteyko's (2017) research which bears similarity to the studies in section 2.2 is the simultaneous use of implicit stigmatisation. For example, an additional frame discussed in their research was *medical progress* in which the ideology of *weight as problematic* and *fat is bad* is expressed under the guise of health messaging, 'being fat is as harmful as smoking' (Atanasova and Koteyko 2017: 658). 'News articles spoke of 'the discovery of new drugs' and instilled a belief in the power of medical research, 'when will there finally be a pill that makes us slim? [...] researchers have come one step closer!' (Atanasova and Koteyko 2017: 658). Within the medical progress frame, narratives of personal blame were also present. For example, individuals and their lack of perseverance were to blame if weight loss drugs failed to show results, 'Alli may not fare so well because many *people will not persevere*' (Atanasova and Koteyko 2017: 659). In these examples the language is largely neutral, but the implications are disparaging towards people with obesity. This indicates that in the case of the media representation of people with obesity, a marginalised social group who are unprotected by discrimination laws, language is used to both implicitly and explicitly stigmatise them. This investigation, which is linguistically focused with a large and representative corpus can provide much insight into this phenomenon, providing rich and definitive evidence as to the exact nature of the discrimination in the obesity media narrative.

Two studies whose results indicated towards clear linguistic patterns and whose papers incorporated some discussion surrounding language are Saguy and Almeling (2008) and Holland et al. (2011). Both studies investigate how misrepresentation occurs when scientific research papers about obesity are reframed in newspapers, and section 2.6 gives an in-depth review of each. However, although not the focus of their research, in terms of the language used in the newspaper articles analysed, both studies noted the use of metaphors. Starting with Saguy and Almeling (2008), they compared the framing of obesity in two special issues on obesity published in the Journal of the American Medical Association (JAMA) published in 1999 and 2003 with the news articles reporting on them (n= 128) (Saguy and Almeling 2008: 60). Their results revealed that the prevalence of obesity and its potential risks to health were conceptualised in news media as an *epidemic* and as a *war* with examples such as ‘the obesity epidemic’ and ‘the obesity time-bomb’ (Saguy and Almeling 2008: 63-64). In addition to highlighting the presence of these metaphors in news articles, Saguy and Almeling also note that they were used at a disproportionately high frequency compared to the scientific articles on which they were reporting (Saguy and Almeling 2008: 63-64). They argue that these metaphors dramatise the issue and magnify the extent to which obesity is harmful to health (Saguy and Almeling 2008: 64). Saguy and Almeling surmise that sensationalist language such as this is used to attract reader attention and facilitate newspaper sales (Saguy and Almeling 2008: 77). Holland et al.’s (2011) research was similar to Saguy and Almeling as they too, examined how scientific research was recontextualised in news discourse. Their results primarily focused on sensationalised and misrepresentative facts (see section 2.6), but the authors did note the use of metaphor in the scientific research article and the news articles reporting on its findings. The scientific report was titled, ‘Australia’s Future ‘Fat Bomb’: a report on the long-term consequences of Australia’s expanding waistline on cardiovascular disease’ (Holland et al. 2011: 31). The use of the war metaphor *fat bomb* was

picked up by the newspapers and used in headlines such as ‘four million Aussies in danger from a ‘fat bomb’, which Holland et al. (2011: 36) argue was a used to attract readers attention. In addition, they argue that the use of militaristic language such as this ‘invokes the rhetoric of the *war against obesity* and positions fat people as a threat to the nation’s health and safety’ (Holland et al 2011: 43). Another metaphor found by Holland et al. (2011) was what they term *competition* metaphors, examples including, ‘if we ran a fat Olympics we’d be gold medal winners’, ‘we would win the gold medal in the world fat Olympics’ and ‘the heavyweight champion of the world’ (Holland et al. 2011: 36). The effects of these metaphors, as argued by Holland et al. (2011: 43), sensationalise the issue and construct people with obesity as letting the side and the nation down (Holland et al. 2011: 43). As discussed, Saguy and Almeling (2008) and Holland et al.’s (2011) papers are reviewed fully in section 2.6, but these specific results reveal interesting insights into the specific language surrounding obesity in news discourse contexts.

Gaining further insight into the linguistic nature of weight discrimination is valuable as research has shown that the discrimination in media negatively impacts people with obesity. Couch et al. (2015) carried out an analysis into individuals with obesity’s (n= 142) perceptions of, and responses to Australian news reporting about obesity. Participants believed that obesity news reporting added to the discrimination they experienced and identified many areas of contention with the news media representation of obesity (Couch et al. 2015: 1). These included, the simplistic and unrepresentative way in which obesity is reported, the focus on personal responsibility and blame and the portrayal of people with obesity as *abnormal* and *freaks* (Couch et al. 2015: 1). Participants (n= 122) felt that the focus on personal responsibility did not allow for issues to be covered in depth or ‘to address the complexities around body weight, weight management, and what it is like to live as a person with obesity’ (Couch et al. 2015: 6). For example, a participant expressed frustration

around the one-dimensional approach, ‘it’s just the simplistic eat better, do more and you’ll be perfect like us’ (Couch et al. 2015: 6). The removal of obesity from any social context and focusing on the message that to lose weight all people with obesity need to do is exercise and improve their eating was described as superficial, unrealistic, inaccurate, unfair and unhelpful by participants (Couch et al. 2015: 5-6). For example, one participant stated,

‘I think they could cover more behind obesity other than what you shove in your mouth . . . there would be a huge difference in attitudes and maybe the way larger people look at themselves if they didn’t feel like they were being attacked everywhere they look.’

(Couch et al. 2015: 5)

In addition, participants (n= 63) expressed the humiliation they experienced with news stories which characterised people with obesity as ‘freaks’ (Couch et al. 2015: 6). Examples given were stories such as,

‘Forklifts needed to lift obese dead people in funeral homes, obese people needing specialized facilities and equipment to weigh them on which would normally be used for machinery or animals, walls knocked down to get an obese person out of their house, and women who were so fat they were not able to go to hospital to have their babies’.

(Couch et al. 2015: 6)

These types of *newsworthy* stories left participants feeling ashamed, othered and reinforced feelings of deviance (Couch et al. 2015: 6). In section 2.1.1 and 2.1.3, the notion of internalised weight bias was introduced, with studies arguing that people with obesity internalise the pervasive negative ideologies surrounding them. Couch et al.’s (2015) study provides further evidence for this notion and highlights the negative impact media representations of obesity can have on those they target.

The evidence provided in the investigations discussed to this point have displayed interesting results in terms of the main themes associated with obesity within their corpora of newspaper articles. However, this review has revealed that there is a distinctive research gap in terms of the specific *linguistic* representation of obesity. Existing analyses make reference to language but are predominantly thematic, meaning that in-depth linguistic patterns and the specific linguistic and lexico-grammatical features linked to obesity were not examined. The use of the military metaphors and the metaphor the *obesity epidemic* was highlighted by Saguy and Almeling (2008), Boero (2007) and Holland et al. (2011). However, in these studies, their metaphorical status is not discussed in-depth and therefore the effects of conceptual metaphors and the effect of connecting two separate phenomena in this manner (discussed fully in section 2.5) is not explored. Another limitation of these studies was that the data sets from which their results are drawn were small, and consequently less representative of obesity news discourse. However, in spite of their limitations, these studies do reveal important insights into the media representation of obesity. For example, the evidence accumulated in these investigations indicates that stigmatising ideologies surrounding weight are perpetuated explicitly through language in addition to implicitly through semantic implications and the intensification and omission of certain facts. This investigation will add to this body of research in two key ways. As discussed, much of the obesity media representation research focuses on overall themes and messages. As the corpus for this research is larger and a more representative sample of the obesity news discourse, the results can provide a rich insight into the key themes and messages surrounding obesity in the media. The second way in which this research will add to and complement the existing literature is by establishing the predominant linguistic features and patterns which construct these themes. As discussed in section 2.1.3, language is a primary way in which weight discrimination is carried out. Therefore, an analysis into the specific linguistic constructions used to achieve

this, has the potential to be used in efforts to dismantle the pervasive stigmatisation against people with obesity in the media and in society.

2.5 Metaphors in Health and News Discourse

The results of Saguy and Almeling (2008) and Holland et al.'s (2011) research highlighted the use of metaphor in obesity news discourse. Metaphors are a common feature of news discourse and are used in the reporting of a wide variety of topics (Semino et al. 2017: 61).

The term *metaphor* refers to the act of discussing one concept in terms of another (Semino 2008: 5). It is argued that metaphors are more than just a characteristic of language, that they are an expression of the human conceptual system and are used to express the way in which we conceive the concepts and topics under discussion (Lakoff and Johnson 1980: 6). Lakoff and Johnson describe these pervasive and subconscious metaphors as 'conceptual metaphors' and suggest that we use them to discuss and understand a multiplicity of concepts (Lakoff and Johnson 1980: 4). They use the concept of *war*, in terms of the conceptual metaphor *argument is war* as an example. 'Your claims are *indefensible*', 'He *shot down* my arguments', 'He *attacked* every weak point of my argument', 'I have never *won* an argument' (Lakoff and Johnson 1980: 4). By discussing the act of arguing in such negative terms, Lakoff and Johnson argue that we begin to view a difference of opinion as something negative, that expressing a different view point entails strategising, winning versus losing, opposing parties and right versus wrong (Lakoff and Johnson 1980: 4). The aggressive and confrontational aspects of arguing are highlighted and embellished through this metaphor, yet the co-operative and constructive aspects are hidden and forgotten (Semino 2008: 3). The *argument is war* metaphor is so predominant and, like most metaphorical expressions, highly conventional. Therefore, it has become naturalised in our language and its metaphorical impact goes unnoticed by most of society (Semino 2008: 9). Conceptual metaphors such as this are effective because discussing concepts in such a way, leads to thinking about and

perceiving topics in such a way (Lakoff and Johnson 1980: 5). Their argument regarding the effect of conceptual metaphors has been at the forefront of wide variety of studies, including research into the language surrounding the representation of health and medical conditions within a diverse range of discourse genres. In the previous section, it was highlighted that research into the news media representation of obesity has made reference to epidemic and war metaphors being utilised. These studies did not carry out an in-depth linguistic analysis into this phenomenon. However, there are a plethora of linguistically driven studies which explore the metaphorical conceptualisation of other areas of health and science. War metaphors in particular are a prevalent result in many of these investigations.

‘Illness, death and the emotions around them are among the sensitive experiences that are often talked about metaphorically’ (Semino et al. 2017: 61). It is argued that to facilitate a non-expert audience’s understanding of complex medical issues, a language producer may explain it through simpler, more relatable and easier to understand metaphorical concepts (Semino 2008: 132). Semino (2008) demonstrated this through her analysis of how the role of the immune system is explained on the BBC bitesize revision pages. Her data consisted of three web pages and 1,283 words and results revealed 71 metaphors containing language semantically related to *war* (Semino 2008: 163). Metaphors are comprised of two concepts, Semino argues, the *target domain* and the *source domain* (Semino 2008: 165). She describes the topic under discussion, which in these examples is the *immune system*, as the target domain and the metaphorical concept it is explained in terms of, which in this example is *war*, as the source domain (Semino 2008: 6). In her data, pathogens were described as *attacking*, *invading* and *destroying* the immune system and the immune system itself was described as *fighting* these external attacks (Semino 2008: 165). It can be argued that linguistic choices like this, when used in an educational genre such as BBC bitesize revision can have a direct impact on the way in which illness is understood and approached in

scientific medicine (Semino 2008: 175). Using the concept of war as a source domain in metaphors conceptualising illness and health is widely criticised. For example, Sontag (1989) argues this particular type of metaphor generates an element of fear towards illness which can have a pejorative effect on those experiencing it and, in addition, the general public's perception towards it (Sontag 1989: 11). The media is one of society's largest industries and plays an integral role in the general public's understanding of health and science (Clarke et al. 2003). Many studies have been carried out on the representation of medical conditions in newspapers and war-themed conceptual metaphors have been a pervasive result. For example, Joffe and Haarhoff (2002) analysed the representation of Ebola in British newspapers and compared these results with the reactions of a select number of readers. They analysed a combination of tabloid and broadsheet newspapers and had a total of 48 articles (Joffe and Haarhoff 2002: 955). They found that fear was a predominant theme throughout their data and was evoked through war-themed metaphors which referred to death and severe illness, potential globalisation and comparisons to AIDS (Acquired Immune Deficiency Syndrome) (Joffe and Haarhoff 2002: 961-2). For example, Ebola was described as 'a *killer bug* which made AIDS look like the common cold', it was reported to '*attack* and digest the internal organs of the body', patients were referred to as '*victims* of the *doomsday bug*' and the globalisation of Ebola was emphasised with statements such as, 'with tourism, air travel and trucking, it is now possible for a *putative doomsday mutant* of Ebola to ripple rapidly outwards from the dead' (Joffe and Haarhoff 2002: 962). Joffe and Haarhoff (2002: 962) describe these statements as sensationalised and dramatized depictions of Ebola designed to stimulate interest in the topic by evoking fear. The secondary aspect to their investigation involved interviewing a total of 50 readers of the newspapers under examination (Joffe and Haarhoff 2002: 955). Participants were asked to talk about Ebola including any information they understood about it and whether they felt at risk (Joffe and Haarhoff 2002: 959). They

found that half of the participants explicitly recognised that the disease was fearful and made reference to death and panic (Joffe and Haarhoff 2002: 963). In addition, Joffe and Haarhoff noted that in 90% of the articles they examined, journalists discussed ways in which Ebola could be dealt with and controlled, yet only 40% of tabloid and 17% of broadsheet readers mentioned this in their interviews (Joffe and Haarhoff 2002: 963). This result highlights the rhetorical strength of these metaphors and suggests that messages articulated through language with intense semantic connotations and implications are more likely to imprint on audience's memories. The fact that readers focus on and retain the sensationalised and dramatized aspects of the articles provides further evidence towards the negative effect war-themed conceptual metaphors can have on societies understanding of complex issues and medical conditions.

The use of *war* as a source domain in metaphors was also found in research relating to the media representation of SARS (Severe Acute Respiratory Syndrome). Chiang and Duann (2007: 597) analysed the representation of SARS in Chinese and Taiwanese newspapers and argued that utilising war-themed conceptual metaphors in reference to SARS politicised the issue. They found that the 'self' and 'other' constructs created through these metaphors fuelled the newspapers underlying political ideologies as the active participant role within the metaphor was often given to the political party the particular newspaper was aligned to. For example, in the *Liberty Times*, which is a Taiwanese newspaper, statements such as, 'The government not only has to *fight against* SARS but also has to cope with the *oppositions saliva war* and *fight back against* China's international repression' (Chiang and Duann 2007: 591). Examples from the opposing Chinese newspaper included, 'the Party and the government have been leading the people in *the battle against* atypical pneumonia' and 'Let us stand united and follow the Party led by Comrade Hu Jintao. Let us *win the battle against* atypical pneumonia' (Chiang and Duann 2007: 594). In Chinese newspapers, the Chinese

government is depicted as *fighting* against SARS as opposed to facilitating SARS and oppressing its people, which is how the Taiwanese press portray them through military metaphors. It can be argued that the newspapers used the issue of SARS as a pretext to highlight and reinforce power structures and their political agenda onto the readers. The aggressive nature of war-based metaphors generates fear and therefore, makes them, their semantic implications and underlying ideologies memorable. An interesting factor in the literature on SARS representation in newspapers is that, in terms of metaphors, the British representation is very different. Washer (2004) and Wallis and Nerlich (2005) investigated this and both found an absence of war-themed metaphors. While Washer (2004) did not carry out an in-depth linguistic analysis, he gave insight into the predominant themes which emerged throughout his investigation. These themes include *the effect on the economy*, *comparisons to earlier epidemics*, *war*, *speculation regarding the cause* and *actions taken by western doctors* (Washer 2004: 2565). Even though *war* was a theme highlighted in Washer's findings, this related to narratives emphasising how the war in Iraq and dealing with SARS was crippling the economy (Washer 2004: 2569). Wallis and Nerlich (2005) carried out a similar investigation and their results were parallel to Washer's. They found that war metaphors were present but not prevalent, and highlight that these articles were published in 2003, not long after the UK went to war with Iraq. The phrase 'war on terror' was frequently utilised in reference to this (Wallis and Nerlich 2005: 2632). This was a major issue at the time and, by comparison, SARS which only affected a small number of people in the UK was not as perilous and was not considered a 'national threat' (Wallis and Nerlich 2005: 2633). They make comparisons to previous epidemics like AIDS and foot-and-mouth disease and contend that because the outbreak of SARS was brief and less ubiquitous within the UK, journalists may not have felt the need to use such strong language in reference to it (Wallis and Nerlich 2005: 2633). Joffe and Haarhoff (2002: 955) argue that war metaphors are

utilised specifically to sensationalise and generate fear. The results of Washer (2004) and Wallis and Nerlich's (2005) research provide further evidence towards this argument. The correlation between the threat level of SARS and the use of war metaphors in the media is evident when comparing the results of these studies. It can be argued that as SARS did not pose an immediate or as severe a threat to the UK compared to countries such as China and Taiwan, the newsworthiness of it as an issue decreased and therefore, the necessity to generate fear towards it decreased. Obesity, by comparison is a pervasive issue in the UK, as detailed by Table 1.1 (page 4). Therefore, analysing the extent to which sensationalism and the perpetuation of fear is expressed through the predominant linguistic patterns in the corpus will be an intriguing research path.

Infectious diseases such as SARS and Ebola are not the only illnesses conceptualised through metaphorical expression. Metaphors, particularly war and journey metaphors pervade cancer discourse (Sontag 1989: 12). Semino et al.'s (2017) research into the use of violence and journey metaphors by patients with cancer and their healthcare professionals provides further insight into how metaphorical conceptualisations can be used to empower and disempower individuals and social groups. They carried out a computer-assisted quantitative and qualitative study of a UK based online forum used by patients and health care professionals, and their corpus totalled 500,134 words (Semino et al. 2017: 60). Their results in terms of the violence metaphors found and analysed were notable. Firstly, the patients used these metaphors to a greater extent at a rate of 1.8 per 1,000 words compared to a rate of 1.33 per 1,000 words for health care professionals (Semino et al. 2017: 62). In addition, when patients utilised these metaphors, they expressed several kinds of scenarios in which they were in a disempowered position (Semino et al. 2017: 62). For example, scenarios in which the disease is fighting the patient, cancer is described as *attacking* from the inside and *invading* the body and a patient describes her breast cancer as a *killer* that *strangles* and shocks your soul

(Semino et al. 2017: 62) ‘In such cases, the disease is presented as an aggressive opponent, while the patient is in a passive position’ (Semino et al. 2017: 62). Another scenario in which patients disempower themselves through these metaphors is when they describe recovery (Semino et al. 2017: 62). For example, ‘it must be dispiriting when you are *battling* as hard as you can, not to be given the *armour* to *fight* in’ (Semino et al. 2017: 62). Finally, a lack of recovery is described in terms of defeat, ‘I feel like such a failure that I am not winning this *battle*’ (Semino et al. 2017: 63). These results indicate that violence metaphors can be used to present the experience as an antagonistic one, in which the patient faces an opponent (Semino et al 2017: 64). In addition, they can be used to present the patient as vulnerable and passive and, in some cases, a failure if the disease is found to be incurable (Semino et al. 2017: 64). Conversely, some patients express their desire to *fight* and *win* and describe themselves as *fighters* in ways that suggest agency and pride, such as ‘I am such a *fighter*’ and ‘my consultants recognised that I was a born *fighter*’ (Semino et al 2017: 63). The results of Semino et al.’s (2017) research reveal three things. The first is that the extent to which violence and war metaphors are polarising and disempowering are context dependent. The research discussed earlier in this section exclusively discussed the pejorative use of war metaphors. Semino et al.’s (2017) results highlight the importance of a contextual analysis when interpreting the effect and potential effects of language patterns under analysis. Secondly, there appears to be a correlation between active syntactic positions and power in these metaphors. This notion was highlighted in the discussion of Chiang and Duann’s (2007) research into the Chinese and Taiwanese Ebola media narrative. In addition, Semino et al. (2017) note, and it is clear from the examples they provide, that some of the cases in which patients were disempowered, they had a passive role and the disease had an active role, described as *attacking* and *invading* the patients. In addition, when patients used these metaphors to empower themselves, they gave themselves an active role, depicting themselves

as *fighting* the disease. The results from Chiang and Duann (2007) and Semino et al. (2017) demonstrate the value in exploring the specific linguistic and syntactic way in which power is distributed when discussing metaphorical conceptualisations. As people with obesity are a marginalised social group, power distributions and the reproduction of power structures within the corpus will be an important aspect of the analysis. Finally, Semino et al.'s (2017) results provide evidence that language can be used to disempower oneself. This notion is not typically explored in linguistic strategies of self and other representation (see section 3.4.3). Therefore, investigating whether people with obesity are given a voice in British newspapers and analysing whether they use their voice to empower or disempower themselves has the potential to further the existing research in this field.

Hendricks et al. (2018) built on the notion that metaphors can influence the way in which issues and social groups are conceptualised by outside sources. They conducted a series of experiments designed to explore how exposure to violence metaphors compared with journey metaphors can affect the way cancer and people suffering with cancer are viewed (Hendricks et al. 2018: 270). Participants (n= 506) were given excerpts to read about a person's cancer experience, either framed as a 'battle' or a 'journey', but otherwise linguistically identical (Hendricks et al. 2018: 276). They then responded to questions designed to explore their judgement of the patient's emotional landscape: 'how likely was the protagonist to feel guilty that they had not done enough if they did not recover? How likely were they to make peace with the situation?' (Hendricks et al. 2018: 276). Finally, participants were also asked to write down any further comments they had about the patient's experience (Hendricks et al. 2018: 276). Their responses to all of the questions were linguistically analysed to compare the language they used in their responses with the language used in the excerpt they read, to determine if there was a correlation (Hendricks et al. 2018: 276). In Semino et al.'s (2017) research it was documented that patients used violence metaphors to conceptualise the guilt

and failure they felt when they were not able to recover. Hendricks et al. (2018: 276) hypothesised that participants who were exposed to the *battle* metaphors were more likely than the participants exposed to the *journey* metaphors to state that the patient they read about was very likely to have felt guilty about not recovering (Hendricks et al. 2018: 276). In addition, they hypothesised that those exposed to the *journey* metaphors were more likely than those exposed to the *battle* metaphors to state that the patient they read about was likely to make peace with their condition (Hendricks et al. 2018: 276). The results proved their hypotheses to be correct. The participants in the *journey* group believed the patient had a higher chance of making peace with his situation than feeling guilty to a statistically significantly greater extent than people in the *battle* group did and vice-versa (Hendricks et al 2018: 277). As the texts the participants were given were identical except for the metaphors used within them, this result indicates that the metaphors had a direct impact on the participants' conceptualisation of the situation. In addition, the analysis of the participants' further comments showed that they tended to use language consistent with the metaphors they were exposed to, demonstrating a kind of priming effect (Hendricks et al. 2018: 277). This involved both the repetition of the metaphorical expressions used in the passage encountered previously and additional *battle* or *journey* related lexical choices (Hendricks et al 2018: 277). For example, those exposed to *battle* metaphors also used words such as *warfare*, *defence*, *weapons*, *battlefield*, *war*, *fight* and *military* statistically significantly more frequently than those exposed to the *journey* metaphor (Hendricks et al. 2018: 275). Conversely, people who read the *journey* metaphor used words such as *road* and *path* in their responses statistically significantly more frequently than those exposed to the *battle* metaphors (Hendricks et al. 2018: 275). These results 'illustrate a metaphor's capacity for building a framework for thinking about complex concepts' (Hendricks et al. 2018: 276). In addition, the results of the second half of the research demonstrate that as well as affecting

the way in which an issue and a social group are conceptualised by an audience, metaphors can affect the future language choices made by the audiences in reference to these issues and social groups.

This type of investigation and this result is not exclusive to Hendricks et al. (2018).

Thibodeau and Boroditsky (2011) conducted a similarly designed investigation into the metaphors used to conceptualise crime and criminals and found ‘that even the most subtle instantiation of a metaphor (via a single word) can have a powerful influence over how people attempt to solve social problems like crime’ (Thibodeau and Boroditsky 2011: 1) Participants (n= 485) were given a news report about increasing crime rates in the city of Addison and asked to propose a solution (Thibodeau and Boroditsky 2011: 1). The news reports contained identical statistics about crime but for half of the participants, crime was metaphorically described as a *beast preying* on Addison, and for the other half as a *virus infecting* Addison (Thibodeau and Boroditsky 2011: 1). When asked about methods of dealing with crime, 20.2% of the participants exposed to the *virus* metaphors compared with 12.5% of the participants exposed to the *beast* metaphors, responded with proposals including rehabilitation solutions and treating the problem by enacting social reform to inoculate the community (Thibodeau and Boroditsky 2011: 5). In comparison, 35% of the participants exposed to the *beast* metaphors compared to 26% of the participants exposed to the *virus* metaphors proposed catching and imprisoning criminals, enacting harsher enforcement laws (Thibodeau and Boroditsky 2011: 5). Imprisoning criminals has a symbolic parallel to animals in captivity, therefore the hypothesis was that those exposed to the *beast* metaphor would be more likely to engage with ideas of imprisonment when asked how to deal with crime (Thibodeau and Boroditsky 2011: 1). While both groups of participants demonstrate a preference for imprisoning criminals in their responses, participants who were exposed to *beast* metaphors demonstrate an increased preference, indicating the metaphors have an effect

on how individual's reason with social issues (Thibodeau and Boroditsky 2011: 2). In addition, when participants were asked which aspects of the articles were influential and shaped their responses, only 3% of the participants cited the metaphors, the rest citing the crime statistics (Thibodeau and Boroditsky 2011: 5). As indicated by previous research into obesity-related news discourse, metaphors such as the obesity *epidemic* are present. The results of the research discussed in this section emphasise how pervasive metaphor use is in news media in terms of facilitating discussions around health and medical conditions. The results of Hendricks et al. (2018) and Thibodeau and Boroditsky (2011) highlight the rhetorical strength of metaphors and demonstrate how they can affect the conceptualisation of the issues and social groups they reference and how they can unknowingly impact the way in which audiences view and reproduce information about the social groups.

2.6 Intertextuality

‘The intertextuality of a text concerns how elements of other, separate texts (words, phrases, arguments, topics or larger elements) are incorporated within it’ (Wodak 2011: 628).

Therefore, intertextuality can, for example, encompass media-reporting about scientific issues, the intertextual components of which include recontextualizing quotes, arguments, research results or specific stances and positions (Wodak 2011: 630). Journalists using commentary from outside sources on the issues under discussion and incorporating their statements or aspects of their statements within articles is common practice (Sundar 1998: 56). ‘For journalists, *source* represents the bread and butter of a news story and editors perpetually mandate that reporters get *quotes* for their stories’ (Sundar 1998: 56). Therefore, intertextuality is an essential and central aspect of newspaper journalism (Sundar 1998: 56). Linguistic research into this phenomenon is vast and wide ranging. Some research, for example has focused on how societal power structures and social hierarchies are reproduced through the specific social actors quoted in the news articles (van Dijk 1998). For example,

individuals with an elevated place in the social hierarchy are considered to be *elite* sources (van Dijk 1998: 87). van Dijk argues that the social hierarchy of power and expertise creates a rhetorical hierarchy of credibility within news discourse and therefore, elite sources are considered to be newsworthy actors, reliable observers and credible opinion formulators (van Dijk 1998: 87). For example, in news reports about industrial strikes, directors of companies and union leaders will be quoted as sources much more often than individual strikers, and in social conflicts, it is high ranking politicians, experts, or police officers whose description of events and evaluation of the facts are called upon (van Dijk 1998: 87). In addition to including elite sources, research has shown their power and expertise is reinforced through characterisations which highlight their authority and credibility (Smirnova 2009: 86).

Smirnova's (2009) research into reported speech in political opinion articles and editorials in British newspapers found that the professional characteristics of their sources including, place of work, academic degree, profession, and position in that profession were emphasised (Smirnova 2009: 86). For example, 'Vincenti Todoli, *director of Tate Modern*', 'Tom Baldwin, *professor of philosophy at the University of York*' and 'Gordon, *Lord of Strathblane*' (Smirnova 2009: 99). Smirnova argues that these professionalisation's are used to further portray the speaker as a person competent in the questions and issues discussed (Smirnova 2009: 99). Calsamiglia and Lopez-Ferraro (2003), whose research focused the representation of mad cow disease in newspapers reported the same findings as Smirnova (2009). When experts and scientists were referenced in their data, professional identity and institutional status was included in their introduction (Calsamiglia and Lopez-Ferraro 2003: 162). For example, 'according to Stanley B. Prusiner, a *teacher of neurology and biochemistry at the University of California*', 'Vincent Zigas, of the *Australia Public Health Service* described' and 'explained *David Krakauer, director of the investigation*' (Calsamiglia and Lopez-Ferraro 2003: 163-5). In addition, in their data, expert voices were

frequently assimilated, for example, ‘*scientists* now say’, ‘*doctors* believe’ and ‘WHO *experts* yesterday assured’ (Calsamiglia and Lopez-Ferraro 2003: 161). An interesting pattern noted was that professional reinforcement was more prevalent when individual sources were used compared to multiple sources (Calsamiglia and Lopez-Ferraro 2003: 161). They argue that through the use of plural form, these sources are ‘presented as a homogeneous, consensual group which have the responsibility of evaluating findings in science and its consequences for the general public’ (Calsamiglia and Lopez-Ferraro 2003: 161). Therefore, much like the addition of professional characteristics with individual sources, the collectivisation of these sources increases the rhetorical weight of their statements as they are presented as being in agreement with each other (Calsamiglia and Lopez-Ferraro 2003: 161). The linguistic reproduction of power structures is a central aspect in the critical analysis of discourse (Fairclough 1992; Wodak 2001). As demonstrated and discussed in section 2.5, the reproduction of power structures can be achieved through the use of metaphor by empowering and disempowering oneself and others. The results discussed in this section so far build on this and provide further evidence for ways in which writers are able to linguistically assign power to individuals and groups in discourse through their use of sources in news articles.

As has been discussed in multiple sections of this chapter, in addition to being a science and health issue, obesity is a sociological issue. Specifically, weight is a characteristic for which individuals are marginalised and discriminated against. Linguistic studies which investigate the representation of marginalised social groups in news discourse have been discussed in section 2.2. Intertextuality was not a focus of these studies, but a common result among them was the discussion of marginalised groups in relation to wider, complex societal issues such as marriage laws, politics and poverty. Issues such as this are complex, and, as argued by van Dijk (1998: 87), when complex issues such as these are discussed, it is powerful and elite

social actors who are more commonly used as sources in the news media representation, as opposed to members from the social groups at the core of the issue. This was a result found by Sclafani's (2008) research into the intertextual representation of Ebonics in The New York Times. Ebonics is an African American language which incites controversy as some groups consider it to be its own language, while others consider it to be dialect of English (Sclafani 2008: 508). Sclafani's investigation focuses specifically on a school board in Oakland, California's decision in 1996 to consider Ebonics as a separate language to English, put in place an official language education policy and apply for extra government funding under the Bilingual Education Act to facilitate this (Sclafani 2008: 508-11). Her corpus was comprised of 69 *New York Times* articles which were published 'within the weeks following this decision' (Sclafani 2008: 512). Her analysis into the reported speech within these articles revealed that a disproportionate number of quoted individuals opposed the decision (59%), 10% expressed ambivalence towards the decision and 31% were in favour (Sclafani 2008: 513). In addition, in accordance with van Dijk's argument, the majority of sources were school officials and politicians, and only 13% of the sources were the students affected (Sclafani 2008: 513). Sclafani argues that these two factors cause an imbalance in reporting which favours one viewpoint and silences those directly affected by the issue, which in this particular case is African American students (Sclafani 2008: 513). In addition, Sclafani's results add to the literature already discussed about how sources are linguistically professionalised in their introduction in news articles. Sclafani notes that, concurrent with the other studies discussed, the sources' expertise and professional status is emphasised. However, in addition to this, the sources' race is also accounted for, but only when the source is a person of colour (Sclafani 2008: 515). For example, 'John H. McWhorter, a professor of linguistic and African American studies at the University of California at Berkeley *who is black*', 'Professor Baugh, *who is black*' and 'some *black* educators' (Sclafani 2008: 515). In

comparison, reference is never made to ‘*white* critics’ or Rick Miller, the *white* Department of Education Spokesperson’ (Sclafani 2008: 515). Sclafani argues that this specific characterisation of sources can be considered as covert racism ‘since it marginalises an oppressed group by distinguishing its members as non-normative’ (Sclafani 2008: 516). In addition, as the majority of African American sources included in the articles express strong opinions in favour of Ebonics as a language, the additional and arguably unnecessary reference to their race deepens and accentuates US racial divides (Sclafani 2008: 515-6). Sclafani’s results demonstrate the importance of analysing intertextuality in texts which deal with marginalised members of society, as the texts analysed in this thesis do.

Disproportionate and unbalanced quotation patterns of ethnic minorities and elite majority’s is a pattern also found in Teo’s (2000) research into news reports relating to a Vietnamese gang named 5T in Australian newspapers. Of the quotes in Teo’s data, both direct and indirect, three quarters were from members of elite, white groups and one quarter were from minority Asian groups (Teo 2000: 18). In addition, similar to Sclafani, there were notable differences in the way in which these two groups were introduced to readers. Elite group members were introduced as ‘Detective Inspector Allan Taylor’ and ‘Cabramatta MP, Reba Meagher’ (Teo 2000: 18-19). In contrast, the minority groups were depersonalised and introduced as ‘youth of Asian appearance’ and ‘16-year-old youth’ (Teo 2000: 19). The results from Teo (2000) and Sclafani (2008) highlight how by seeking quotes and opinions from predominantly elite majorities, ethnic minorities can be silenced. In addition, their results demonstrate how social hierarchies are supported and reproduced and how social divides can be generated and perpetuated through intertextuality. Therefore, based on this evidence, the extent to which this is a phenomenon occurs in the obesity media narrative is a research path worth exploring.

In addition to the way in which the sources are introduced, much can be revealed from their quotes, statements and research results. In section 2.3, studies which investigated the media representation of dementia were discussed. A pattern among the results of these studies was a representation which was stigmatising, sensationalised and simplified. This representation of dementia was also found in Brookes et al.'s (2018) investigation, which explored how a report concerning dementia originally produced by The Office for National Statistics (ONS), in which dementia was described as 'the leading cause of death in England and Wales' was reproduced and reported on in British newspapers (Brookes et al. 2018: 371). The primary fact discussed in the ONS bulletin, which is then repeatedly reproduced in the media states that dementia accounted for 11.6% of all deaths registered in 2015 (Brookes et al. 2018: 371). Examples from the news articles which reported on this include, 'of the 529,655 deaths registered in England and Wales in 2015, 11.6% were attributable to dementia or Alzheimer's, *according to the Office for National Statistics*' and 'Dementia and Alzheimer's are now the biggest cause of death in England and Wales after jumping by a fifth in a single year, *official figures show*' (Brookes et al. 2018: 376). In these representative examples, the journalists are using the status of ONS to legitimise a fear-based frame which depicts dementia as Britain's 'biggest killer', foregrounding and exaggerating the scale and impact of dementia, enhancing the story's newsworthiness (Brookes et al. 2018: 377). When the fact that dementia accounts for 11.6% of the deaths registered in 2015 is taken out of context, it becomes a misrepresentation of the issue. Brookes et al. (2018) detail how many of the additional crucial facts and information provided in the ONS report are omitted from the news media. For example, an additional fact discussed in the ONS report was that, previous to the release of the report, if patients with dementia contracted an additional illness such as pneumonia, and this lead to fatality, their death would not have been documented as being caused by dementia (Brookes et al. 2018: 372). However, now these types of deaths are

exclusively coded as dementia and this contributes towards the increase in dementia patient mortality rates (Brookes et al. 2018: 372). Pneumonia, as opposed to dementia itself is the cause of death for up to two-thirds of dementia patients, therefore, to describe dementia as ‘the biggest cause of death, ‘jumping up by a fifth’ is a gross misrepresentation (Brookes et al. 2018: 372). The selective nature in which this report is discussed in its news media representation, whereby certain facts are highlighted while other crucial facts are ignored, accords with the results discussed in the section 2.3, suggesting that a ‘catastrophised fear-inducing narrative is favoured over complex and nuanced scientific reporting’ (Brookes et al 2018: 372).

Taking statements and quotes from one context and recontextualising them to complement the narrative in another context is the cornerstone of intertextuality in the media, with many studies producing results similar to Brookes et al. (2018). For example, the primary point of analysis in Holland et al.’s (2011) research introduced in section 2.4 was to analyse intertextuality. Specifically, they examined Australian newspaper coverage of a scientific research paper titled ‘Australia’s Future ‘Fat Bomb’: a report on the long-term consequences of Australia’s expanding waistline on cardiovascular disease’ (Holland et al. 2011: 31). The primary points in the research paper were focused on the prevalence of obesity in Australia, the associated risks to cardiovascular disease, the costs associated with this and finally, it promotes the notion of losing 5kg over 5 months to circumvent all of the reported data (Holland et al. 2011: 35). Headlines from news articles reporting on this research included, ‘a nation of fatties – Australia outweighs United States on obesity scales’, ‘Australia pips US as world’s fattest nation’ and ‘four million Aussies in danger from a ‘fat bomb’’ (Holland et al. 2011: 36). As can be seen in the last example, the hyperbolic metaphor *fat bomb* was reproduced in the media. In addition to this, the evidence provided by Holland et al. demonstrates how the Australian media incorporated a new narrative into their reporting, a

narrative which depicts Australia as having higher rates of obesity than America. The participants in the research these articles were reporting on were exclusively middle-aged Australians and no comparisons to America's obesity figures were made or discussed in the report (Holland et al. 2011: 36). Therefore, in addition to the omission of facts in news media narratives, which has been a prevalent result in studies investigating the representation of science and health in the media, Holland et al.'s (2011) research provides evidence that news media can also create and insert false notions into the narrative under the guise of scientific research and scientific facts. It has been a consistent argument in the research discussed in this section so far that the rhetorical power of statements and opinions of elite social actors such as scientists and experts is high. Therefore, incorporating false and misrepresentative notions among facts has the potential to convince audiences to accept the misrepresentative narrative presented to them. Another example from Holland et al. (2011) where journalists incorporate separate ideologies and narratives into their reporting can be found in this extract, 'A grim picture is painted of expanding waistlines *fuelled by a boom in fast food and a decline in physical activity, turning us into a nation of sedentary couch potatoes*' (Holland et al. 2011: 37). Again, the research these articles are reporting on did not reference the aetiology of obesity, or reference lifestyle choices such as these, but the news reports feature commentary which suggests the opposite (Holland et al. 2011: 37). It is clear from the examples provided by Holland et al. (2011) that the news media are taking dominant ideologies and stereotypes surrounding weight, such as the prevalence of obesity in America and that obesity is a result of gluttony and laziness, and inserting them into their reports in a way which suggests they are part of and results of scientific research. In addition, Holland et al. found evidence of the pervasive ideology which treats fatness and unattractiveness as synonymous within their data, through the use of hyperbole and imagery in phrases such as *fat arses, burgeoning bellies, flabby flesh, fat, lazy Australian arse, unsightly slobs* (Holland

et al. 2011: 39). Holland et al. argue that the combination of all the misrepresentative and irrelevant ideologies inserted into these news articles under the guise of expert opinion creates an *us* versus *them* divide between people with obesity and the rest of society, the former being characterised as unattractive, lazy and putting others at risk by failing to ‘limit their calorie intake’ (Holland et al. 2011: 39). Newspapers supporting and perpetuating these false and stigmatising ideologies, particularly in the manner highlighted by Holland et al. (2011), can have a significant impact on society. Empirical research by Sundar (1998), for example, showed that readers of news stories found stories to be statistically significantly more credible if they featured quotes, statements and research results from external sources (Sundar 1998: 62). Therefore, it can be argued that referencing research in the way the news articles in Holland et al.’s (2011) research have, legitimises the ideologies embedded within the journalistic commentary, such as equating fatness to unattractiveness and laziness, even though the original text did not contain these ideologies. A final note made by Holland et al. was that only one article in their data set challenged the media discussions surrounding the fat-bomb research paper, stating that ‘we were just a bit concerned that the statistics that came out about us being the fattest in the world is not based on a population survey’ (Holland et al. 2011: 41). Holland et al. argue this is due to the concept of newsworthiness, ‘that evidence for a risk is likely to attract more news value than evidence which suggests the extent of the risk has been exaggerated’ (Holland et al. 2011: 41). The results of Holland et al.’s (2011) research correspond to those discussed in section 2.3. Negative but pervasive ideologies about weight are incorporated into the narrative, certain facts and statements are propelled to the forefront and are used to shape the narrative, while other crucial facts and statements are omitted, resulting in unbalanced, misrepresentative and stigmatising news articles.

Saguy and Almeling (2008), also introduced in section 2.4, have carried out an analysis similar to Holland et al. (2011). Their analysis is similar in that they have systematically examined the intersection of scientific reporting and news reporting about obesity (Saguy and Almeling 2008: 56). However, their research differs to Holland et al. (2011), as there is a greater focus on language and how obesity is linguistically constructed as a social problem in news discourse compared with scientific discourse (Saguy and Almeling 2008: 53). Their data consisted of special edition scientific publications on weight and health (n= 20) published in 1999 and 2003, press releases (n= 8) and news articles from American, Canadian and British newspapers reporting on these publications in 1999 and 2003 (n= 128) (Saguy and Almeling 2008: 60-2). In accordance with the results found in Holland et al. (2011), ideological perspectives were misrepresented in the news media representation of scientific research (Saguy and Almeling 2008: 67). For example, news articles also overemphasised and moralised an individual's role in their weight beyond the science on which they were reporting (Saguy and Almeling 2008: 67). Factors under individual control, particularly those thought to reflect moral character were attributed to obesity, such as choosing to be sedentary or making bad food choices (Saguy and Almeling 2008: 67). Of the news reports analysed in 1999, 72%, compared to 40% of the scientific articles the news reports were reporting on, evoked individual contributors to weight (Saguy and Almeling 2008: 67). In 2003, 98% of the news articles analysed evoked individual contributors to weight compared with 40% of scientific articles (Saguy and Almeling 2008: 67). An example from Saguy and Almeling's newspaper data is the extract, '300,000 Americans die each year from eating millions of cookies, hot dogs, potato chips and other empty calories during increasingly inactive lives, according to another report also published in JAMA' (Saguy and Almeling 2008: 67). The specific scientific study this article was referencing reported no data on the eating or exercise behaviours of their respondents (Saguy and Almeling 2008: 67).

Therefore, Saguy and Almeling's results provide further evidence that news media can incorporate separate, unsubstantiated ideologies and insert them into their news reports under the guise of scientific research and opinion. In addition to the ideological differences between scientific reporting and news media reporting, Saguy and Almeling found that 'compared to the science on which they were reporting, the news media used more evocative metaphors and language to discuss obesity' (Saguy and Almeling 2008: 77). They reported in their results that in 1999, 20% of the scientific studies analysed referred to obesity specifically as an *epidemic*. For example, a scientific report in their data was titled, 'The Spread of the *Obesity Epidemic* in the United States, 1991-1998' (Saguy and Almeling 2008: 65). By comparison, obesity was specifically framed as an *epidemic* at a more prevalent rate, in 49% of the news articles analysed (Saguy and Almeling 2008: 64). For instance, 'there's a rapidly spreading *epidemic* afflicting all regions of the country, all ethnic and economic groups, and all ages ... It's not SARS, West Nile virus, or Lyme disease. It's obesity' (Saguy and Almeling 2008: 65). In 2003, the disproportionate use of the *epidemic* conceptualisation was still present, with 20% of the research papers using it and 31% of the news articles reporting on them using it (Saguy and Almeling 2008: 67). In addition, Saguy and Almeling highlight that none of the scientific studies analysed conceptualised obesity in terms of *war* in 1999 or in 2003, yet 46% of the news articles under analysis in 1999 and 31% in 2003 utilised war metaphors in reference to obesity (Saguy and Almeling 2008: 64). For example, one news article quoted a diabetes specialist saying, 'obesity is a *time bomb*', despite the fact that the diabetes specialist in question did not use those specific words (Saguy and Almeling 2008: 65). Referring back to the discussions in section 2.4 surrounding the effect of conceptual metaphors, military and epidemic metaphors have been proven to evoke divisive ideologies and affect the way in which readers of these metaphors conceptualise social issues (Thibodeau and Boroditsky 2011; Hendricks et al. 2018). Therefore, it can be argued that the

presence of epidemic and war-themed metaphors in news discourse, a medium with a large audience, further stigmatises obesity and could have a significant impact on social attitudes towards weight. Saguy and Almeling make a similar argument seen in many of the studies discussed in this chapter, that the news dramatise and sensationalise the carefully selected aspect of an issue they discuss (Saguy and Almeling 2008: 76). However, they further this point to include the role of and the linguistic impact of the press release. In 1999, war metaphors were not used in any of the scientific studies referenced in the news discourse they analysed, yet 46% of the news articles used them. When analysing the press releases, they discovered that war metaphors were present in them, which can also explain in part why war metaphors have a disproportionate presence in the obesity news media narrative compared to scientific journals (Saguy and Almeling 2008: 76). This underscores the important intermediary role that press releases have in the linguistic choices made by journalists reporting on scientific research (Saguy and Almeling 2008: 76), and therefore, the role of press releases and journalistic procedure will be incorporated into the discussions in this research.

The results discussed in this section highlight how intertextuality can be used to perpetuate and reinforce social power structures, silence and exclude marginalised groups and misrepresent and reshape facts. This investigation can particularly build on research surrounding the linguistic representation of science in obesity related discourse. Both Holland et al. (2011) and Saguy and Almeling (2008) make reference to metaphors, but in-depth discussions surrounding the semantic connotations of these metaphors and the effect they have on social attitude towards weight did not feature in their analyses. However, their research, in addition to all of the studies discussed in this section, provide evidence that intertextual components within news discourse are ways in which covert misrepresentation

and discrimination can and does occur. Therefore, this research will explore this, build upon and complement the existing literature.

2.7 Personal Stories in News Discourse

Section 2.6 detailed how the external sources called upon in news media to provide statements and opinions are accredited, elite sources in powerful and privileged institutional positions who act as spokespeople for the issue under discussion. Hall et al. (1978: 61) argue that this imbalance of voices can construct a definition of social reality which is misrepresentative and uninformative. They describe these individuals as the ‘primary definers’ of topics who establish the primary interpretation of the topic in question, within which all further coverage or debate takes place (Hall et al. 1978: 61). Hall et al. (1978) give the example of race relations in Britain in the nineteen seventies. Conservative and elite voices, the primary definers, defined race relations as a ‘problem of numbers’ and in order to counter these claims and prove these figures had been exaggerated, liberal oppositions had to provide numbers and therefore, were obliged to subscribe to the view that the debate is ‘essentially about numbers’ (Hall et al. 1978: 62). The primary definition sets the limit for all subsequent discussions by framing ‘what the problem is’ (Hall et al. 1978: 62). As detailed by the studies in the previous section, elite social actors, or primary definers are the preferred, most frequently used sources in news discourse. It is argued that when members of the public are included, they play the subordinate role of ‘symbol people’ and are often marginalized because of the dominant narrative within which they operate (Kunelius and Renvall 2010: 515).

Birks (2017) analysed the role of personal stories in 113 articles about the *bedroom tax* published in the *Daily Mirror* and *Sunday People* newspapers (Birks 2017: 1346). The bedroom tax was an aspect of a wider conservative government austerity agenda aimed at redefining what was adequate or ‘fair to the taxpayer’, whereby those who were judged to be

‘under-occupying’ their social housing by having a ‘spare room’ were compelled to either move to a smaller home or lose 14 per cent of their government housing benefit (Birks 2017: 1350). The aim of Birks’ research was to identify and analyse the gap between official rhetoric surrounding this issue and personal experience in newspapers (Birks 2017: 1346). The individuals directly affected by this policy, benefits claimants, ‘are one such group routinely othered in popular news discourse, stereotyped as lazy or hampered by dependency, profligate and having excessive children’ (Birks 2017: 1348). In accordance with Hall et al.’s (1978) argument, personal testimony from benefits claimants was not a dominant feature of the bedroom tax media narrative (Birks 2017: 1346). However, the results found by Birks from the news articles which did include personal stories display an interesting pattern. As discussed, the primary defined narrative surrounding benefits claimants include stereotypes such as laziness and a lack of motivation. Birks found that, as Hall et al. (1978) suggested, the benefits claimants featured in news articles operated within this narrative and spoke about these tropes. However, in their self-representation as ‘good victims’, the conventional judgements and negative stereotypes about those who claim benefits and social housing remained largely unchallenged (Birks 2017: 1348). For example, a pub barmaid described herself as having ‘worked all her life – and still does’, ‘I’m no scrounger’, she said, proudly. ‘I would happily move to a smaller place but there just aren’t any to be had’ (Birks 2017: 1355). On one hand, it can be argued that as this source represents the low paid and precariously employed *working poor*, she challenges the dominant societal narrative which dictates that everyone who claims benefits are lazy and unmotivated (Birks 2017: 1355). However, it can also be argued that as this source specifically separates herself from *scroungers*, in her statement, ‘I’m no scrounger’, she implicitly reinforces the notion and stereotype that individuals who claim benefits are lazy and unmotivated. This can be seen in another example provided by Birks, ‘I just don’t understand why disabled people are being

scapegoated’, Lindsey says. ‘We don’t want to be on benefits. *It makes me sick to think that people think we’re scroungers*. We don’t drink, smoke, do drugs or even go on holiday’ (Birks 2017: 1366). In this example, the source Lindsay is also separating herself from *other* individuals who claim benefits. In addition, she reinforces stereotypical behaviours associated with individuals who claim benefits such as smoking, drinking and doing drugs. Another source with a disability distinguished herself from ‘fraudulent people’ and stated that ‘genuinely ill people don’t *play the system* and they get hit hardest’ (Birks 2017: 1356). The sources in Birks’ data demonstrate the phenomenon introduced by Hall et al. (1978). The Conservative government, or the *primary definers* have shaped a narrative in which people claiming benefits are problematic and lazy. As can be seen by Birks’ examples, when countering these claims, the individuals are operating within this negative narrative, establishing how they are different, better and not lazy, fraudulent or *scroungers*. However, in the process of doing this, they are indicating that some individuals do possess these characteristics, thereby reinforcing the narrative and stereotypes shaped by the *primary definers*. Only 16.3% of the personal stories analysed by Birks (2017) challenged stereotypes of benefits claimants as a group. For example, one source rejected the stereotypical labels not just for herself but for all benefits claimants, ‘people talk about scroungers getting rich on benefits, but I haven’t met any’ (Birks 2017: 1356). It is clear from the examples that Birks provides, that the personal narratives found in her data were not used to absolve the community within which the individuals belonged of the negative tropes and stereotypes attached to them. Their narratives were largely used to absolve themselves and highlight how they were different and separate from the marginalised, deviant group and similar to the dominant, virtuous group.

Similar results can be found in Lens’s (2002) investigation into the stories welfare recipients told about their lives and experiences in the *New York Times* and the *Washington Post* during

the 1996 debate over welfare reform (Lens 2002: 1). The stereotypes attached to poor communities in America are similar to those attached to poor communities in the UK. The poor in America are denigrated and stigmatised with women on welfare in particular depicted as lazy, promiscuous and inept (Lens 2002: 2). Lens analysed a total of 319 articles, with 144 articles from the *Post* and 175 articles from the *Times* (Lens 2002: 5). Similar to Birks (2017), only 10% of the sources used in articles about welfare were recipients of welfare and individuals from the communities under discussion (Lens 2002: 6). The stories generated a portrait of recipients which mirrored and reinforced stereotypical images of recipients as individually dysfunctional, incompetent and child-like (Lens 2002: 6). For example, one source described being so befuddled that ‘even now social workers must tell her where to put her first and last names on forms’ (Lens 2002: 6). Another woman described how ‘when I first walked into that store, I thought Betty, just turn around and walk back out of here. I couldn’t even take orders for the first couple of hours. I was stuttering’ (Lens 2002: 6). Another detailed how she could ‘not afford to get fired, but I am not quick’ (Lens 2002: 6). In these examples, Lens (2002) highlights another stereotypical trope attached to individuals from a low socioeconomic background which is low intelligence. The examples she provides demonstrate how the sources are contributing to the primary narrative and attributing these negative characteristics to themselves. Even when the problematic, systemic elements of society which contribute to poverty such as low wage work are discussed, this did not offset the perceived personal faults of the sources (Lens 2002: 7). For example, recipients who complained that low wage work kept them poor also implicated their ‘bad attitudes or insufficient drive’ in their failure to get off welfare and become self-sufficient (Lens 2002: 7). In section 2.5, Semino et al.’s (2017) research results provided evidence that metaphors used by cancer patients can be used to disempower oneself. Self-disempowerment and self-discrimination can also be seen in these examples provided by Lens (2002). In addition, Lens,

similar to Birks (2017) found that some welfare recipients were quick to criticise other recipients claiming they were lazy, irresponsible and manipulated the system (Lens 2002: 7).

For example, one recipient stated that,

‘some people just like to sit home and collect welfare. Some people just don’t care, they figure they’ve got an income coming in and they don’t have to do nothing, while me, I’m out here trying to do something with myself and set an example for my children.’

(Lens 2002: 7)

Lens argues that in these particular circumstances, recipients were mirroring, if not endorsing, the dominant ideology that permeated the public discourse on welfare (Lens 2002: 8). These ideologies ignore the structural and systemic deficiencies within the financial and economic system which cause poverty, and instead blame the welfare system and the individual deficiencies of those within it (Lens 2002: 8). In the examples discussed so far, recipients have overtly perpetuated negative ideologies about welfare claimants through self-condemnation and denigration and through the condemnation and denigration of others within their community. The final result Lens (2002) highlights, demonstrates how the reproduction of these ideologies can be concealed within more favourable self-accounts from recipients. For example, a women stated she was ‘answering hundreds of job postings and even working for free to improve her resume’ and ‘pulling double shifts six or seven days a week to provide for herself and her daughter’ (Lens 2002: 8-9). Another said ‘I feel good about myself now. I never felt so good in my life. I’m doing something important and working toward a career’ (Lens 2002: 9). In examples such as these, the representations of the sources and welfare recipients are more favourable than previous examples. However, underlying these statements are an endorsement of the conservative framework which dictates that adherence to work ethic is the only route out of poverty, and that only by

idealising this middle class work ethic can one escape the stigma of being a welfare recipient (Lens 2002: 9). Lens (2002) and Birks (2017), provide interesting insights into the way in which individuals represent themselves and the marginalised social group they belong to in personal news stories. However, neither of these studies had a linguistic focus, and as a result further evidence supporting the arguments they make were not discussed. For example, a source from Lens's (2002) data stated, 'I feel good about myself *now*' (Lens 2002: 9). *Now* is a presupposition trigger (Levinson 1983: 182) which presupposes the notion that before this source worked, she felt negatively towards herself, thereby reinforcing the ideology that claiming welfare is worthy of stigmatisation. Lens argues this to be the case, that statements such as these still implicitly support biased ideologies, but the addition of linguistic evidence and discussions surrounding the lexical and grammatical constructions which influence this are not present in either study. These specific discussions would strengthen the arguments being made by both Lens (2002) and Birks (2017), and therefore, this research, which will provide in depth discussions surrounding the lexical and grammatical constructions which contribute to bias ideologies, will begin to fill this specific research gap.

The results and arguments presented by Hall et al. (1978), Lens (2002) and Birks (2017) have all been unanimous in that individuals from marginalised groups who are used as sources in news discourse operate within a dominant and an already biased narrative, and rarely introduce counter, less stigmatising narratives. Nairn and Coverdale (2005) carried out an investigation similar in design to Lens (2002) and Birks (2017). Their research focused on personal stories in news discourse published in New Zealand, but instead of benefit and welfare recipients, their data was comprised of stories about individuals with mental health disorders such as schizophrenia (Nairn and Coverdale 2005: 282). Nairn and Coverdale's results displayed similarities to Lens (2002) and Birks (2017) in terms of underrepresentation. In their corpus of 600 news articles, only five (0.8%) offered readers access to thoughts,

explanations and depictions provided by people living with a diagnosed mental disorder (Nairn and Coverdale 2005: 282). The dominant, and primary narrative in the remaining 595 articles within Nairn and Coverdale's corpus was abound with references to third party sources and focused on abnormal and deviant acts carried out by those who suffer with mental illness (Nairn and Coverdale 2005: 281-2). Within the five news articles which contained personal stories, Nairn and Coverdale found, unlike Lens (2002) and Birks (2017), that the individuals referenced, while still operating within the primary narrative, offered counter narratives to dispel stereotypes and condemn stigmatisation (Nairn and Coverdale 2005: 284). For example, speakers presented those living with a mental illness as ordinary and unremarkable members of society who engage in everyday activities and who recognize themselves as being productive and having social standing, 'we cook, wash, iron, and organising our lives, we come off the same streets everyone else walks on' (Nairn and Coverdale 2005: 284). In addition, the speakers constructed themselves and others as living with the effects of stigmatising beliefs and prejudices about mental disorders (Nairn and Coverdale 2005: 285). For example, speakers emphasised that they faced 'unwarranted fear and condemnation', they detail feeling 'scared of what people will think', and that often they 'don't want to go outside the door due to facing daily discrimination and prejudices. We struggle for acceptance' (Nairn and Coverdale 2005: 285) The speakers in these articles offered qualitatively different depictions of mental illness in newspapers compared to the remaining articles in Nairn and Coverdale's corpus (Nairn and Coverdale 2005: 286). These speakers do not perpetuate the dominant ideologies featured in the primary narrative surrounding them such as deviant acts of violence or an inability to participate in society. The examples provided by Nairn and Coverdale demonstrate that these sources use the platform of newspapers to counter these notions and highlight and condemn the stigmatisation they face from the rest of society. This result is different to that of Lens (2002) and Birks (2017).

A factor to consider is that Nairn and Coverdale were only able to analyse five articles, compared to the hundreds analysed by Lens and Birks and therefore, the differences in their findings could be a result of this. However, the social group at the forefront of Nairn and Coverdale's research was different to Lens and Birks and this could also be a contributing factor to the differences in results. Moving forward with this research it will be important to analyse how individuals with obesity represent themselves compared to those living in poverty and those living with mental illness. A parallel between individuals living in poverty and individuals living with obesity is the personal blame which features as a dominant ideology in the primary narrative surrounding each issue. It was clear from Lens and Birks' research that the individuals featured in the articles they analysed had internalised some of the bias ideologies surrounding them. The research suggests (see section 2.1) that individuals with obesity, too, internalise the weight bias surrounding them. Therefore, taking this and the results of Lens and Birks' research into consideration, analysing the extent to which people with obesity self-discriminate in news discourse will complement and add to the research which has already been published in this area.

A consistent result within the research discussed in this section was the infrequency with which individuals from marginalised social groups are used as sources in news articles about issues concerning them. In addition, they show that when these individuals *are* given a platform in news media to share their stories, the narrative they provide is a reproduction of the dominant narrative surrounding them. Benefits and welfare claimants made reference to and tried to dispel associations of laziness and people living with mental illness worked to dispel beliefs that they cannot lead normal lives and act in manners societally deemed to be *normal*. In order to counter negative stereotypes and ideologies which permeate dominant narratives about them, marginalised individuals must reference and highlight these negative stereotypes and ideologies, and are therefore, still operating within the dominant, primary

narrative. As seen in the results of the research, there are nuances in the way in which this is specifically carried out. For example, benefits and welfare claimants further stigmatised themselves by overtly reproducing the negative ideologies attributed to them and by separating themselves from others who claimed benefits. Conversely, individuals with mental illnesses, although still making reference to ideologies associated with them such as an inability to live normal lives, dispelled these on behalf of themselves and all people living with mental illness. Therefore, there is evidence in the literature of individuals using news media platforms to empower and stigmatise themselves and the marginalised group in which they belong. This type of analysis has not been carried out on many marginalised groups, and so an analysis of this nature on a large corpus of news articles will complement and add further evidence to the research in this field. In addition, these analyses have not had a linguistic focus and therefore, discussions surrounding the extent to which particular lexical and grammatical features overtly or implicitly incite negative self-representations has not yet been explored.

2.8 Contextualising this Research

After conducting a review of the existing literature in the field it is clear that this research will build on and enhance the results found and the arguments made in three distinct ways. The first is the linguistic focus of this investigation. As detailed in section 2.1, language, weight bias and weight stigma closely intersect, with verbal slights and abuse being the primary method through which weight stigma is enacted. However, the body of research in weight bias and fat studies fields is small and does not explore or represent this phenomenon. Therefore, researching weight bias from a linguistic perspective will contribute towards filling this gap, will complement the research which currently exists and could be beneficial in efforts to further empower and advance the growing Fat Acceptance movement. The news media representation of obesity is another research area in which linguistic analyses are

largely absent. Current studies make reference to language patterns such as metaphors, but an in-depth analysis and discussion into the implications of these language patterns are not an aspect of any of the research discussed. In addition, the research which has been carried out and published details that the pervasive themes in the news media representation of obesity emulate the bias ideologies which exist around weight, such as greed and lack of self-control. Analysing the specific lexical and grammatical patterns used to articulate this message will provide a new perspective to the research in this field. Research which focuses on personal stories in news discourse also lacked a linguistic focus. The results found that statements made by people directly affected by issues such as poverty implicitly support bias ideologies. Therefore, the addition of linguistic evidence and discussions surrounding the linguistic constructions which influence this would strengthen the arguments being made and begin to fill this specific research gap.

The second way in which this investigation can add to the existing research is through the data. The corpus for this investigation is large and representative of the British obesity media narrative over the last decade. Therefore, it can provide rich and definitive evidence regarding the levels of and the exact nature of the weight discrimination which occurs through this medium. Another limitation of the current, published research into news media representations of weight and obesity was the small data sets the investigations were based on. The largest amount of data analysed was by Atanasova and Koteyko (2017) whose corpus totalled 768 articles. In addition, this was a problematic feature of the research into personal stories in news discourse, with one study carried out by Nairn and Coverdale (2005) only analysing five articles. To compare, this research has a corpus of 16,419 articles. In addition, the methodology combines quantitative and qualitative approaches to research. Therefore, the arguments made concerning language, weight and obesity will be reinforced by large

amounts of quantified linguistic evidence, which has not been a feature of the results in these specific areas to date.

Finally, many of the studies discussed in this section including those focussing on metaphors, the representation of marginalised groups in news discourse and the representation of science and health in news discourse had a linguistic focus, a representative corpora and sometimes both, but did not focus on obesity and weight stigma. The presence of metaphors in obesity news discourse has been documented but not fully linguistically analysed and previous research into the metaphoric conceptualisation of illness has highlighted how metaphors can be used to empower and disempower individuals (Semino et al. 2017). Therefore, analysing the metaphorical conceptualisation of obesity in a large corpus could provide further insight into how weight and obesity are stigmatised in the media and fill a research gap in the existing literature surrounding metaphors. In addition, obesity and weight are marginalised characteristics and the results accumulated by studies into the representation of other marginalised groups in news media detail how seemingly neutral language with biased implications are used to discriminate against these groups (Manning-Miller 1994; Baker 2005; Baker and Gabrielatos 2008; Baker et al. 2008; Carlin and Winfrey 2009; Murray 2014; Baxter 2018; Turner et al. 2018). As obesity is not a legally protected characteristic in the UK, unlike gender, race and sexuality for example, an analysis into the similarities and differences of its media representation will complement and add a further dimension to this field. In addition to being a marginalised characteristic, obesity relates to science and health. This too, was an area of research which had an absence of obesity related research and therefore, this is another area this research will add to. To conclude, the topic of this research, the data used in this research and the linguistic focus of this research, collectively make this an original investigation which has the potential to add value and insight, not only to the field of linguistics, but the fields of media, weight stigma and fat studies.

3. Methodology

The data analysed in this research is comprised of British national newspaper articles published between 1st January 2006 and 31st December 2016, all of which are about obesity. The newspapers under analysis are, *The Daily Express*, *The Daily Mail*, *The Daily Star*, *The Daily Telegraph*, *The Guardian*, *The Independent*, *The Mirror*, *The Sun* and *The Times*. The corpus (OiBP) is comprised of 16,419 articles and, after the removal of the metadata, 9.7 million words. The methodology employed to analyse the data was a combination of quantitative and qualitative approaches to research, specifically using Corpus Linguistic (CL) and Critical Discourse Analysis (CDA). The exact approach taken was a Corpus-Assisted Critical Discourse Analysis, where CL methods were used as a ‘point of entry’ to downsize OiBP by highlighting significant keywords, collocations and prevalent linguistic patterns (Baker 2010: 138). These linguistic patterns were then qualitatively analysed taking a CDA approach. Specifically, a combination of Fairclough’s (1992) dialectal relational approach and Wodak’s (2001) discourse historical approach, incorporating contextual and historical components into the analysis to shape strong arguments concerning the ideological representation of weight and obesity in British newspapers. The specific linguistic frameworks referenced and discussed within the qualitative analysis include van Dijk’s (1980) notion of semantic macrostructures, Reisigl and Wodak’s (2001) five discursive strategies of representation and van Dijk’s (1998) ideological principals of representation. Taking this approach allows for the analysis of a large amount of data, removes some analyst bias from the methodological process and reliable arguments about language, society and weight-based ideologies are made and supported by large amounts of quantified linguistic evidence.

3.1 Obesity in the British Press (OiBP) Corpus Design

The corpus for this research is titled ‘OiBP’, which is an acronym for ‘Obesity in the British press’. The OiBP corpus is comprised of newspaper articles of all kinds, including Sunday editions published in the British national newspapers, *The Daily Express*, *The Daily Mail*, *The Daily Star*, *The Daily Telegraph*, *The Guardian*, *The Independent*, *The Mirror*, *The Sun* and *The Times*. The specific articles analysed in this investigation were published between 1st January 2006 and 31st December 2016. This eleven-year time period was chosen so that the corpus would be representative of the British obesity news discourse and therefore, could provide insights into the representation of obesity and the nature of weight discrimination in British newspapers. Table 3.1 details the exact number of articles across the eleven-year period and the distribution of articles across each newspaper respectively. Tables containing word counts each year for each individual newspaper can be found in the Appendices (Appendices 1-9). In addition, Table 3.1 distinguishes between the tabloid and broadsheet newspaper frequencies. The tabloid and broadsheet distinction can be problematic as some newspapers are harder to define than others for reasons such as size, writing style and the changes in these factors over periods of time (Baker, Gabrielatos and McEnery 2013a: 7). In OiBP, following the practice of Baker, Gabrielatos and McEnery (2013a: 9), the tabloid and broadsheet distinction was determined predominantly by writing style. Therefore, *The Daily Express*, *The Daily Mail*, *The Daily Star*, *The Mirror* and *The Sun* have been categorised as tabloid newspapers and *The Daily Telegraph*, *The Guardian*, *The Independent* and *The Times* have been categorised as broadsheet newspapers.

Table 3.1: Frequency of Articles Published Throughout the Years, Newspapers and Newspaper Types

	2006	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016	Total
Tabloid												
Daily Express	27	28	45	188	261	214	142	148	132	79	71	1,335
Daily Mail	226	350	311	145	119	191	143	151	231	216	157	2,240
Daily Star	34	139	47	40	41	53	34	27	26	27	21	489
The Mirror	147	156	202	171	177	241	289	225	262	137	97	2,104
The Sun	97	102	154	171	116	136	243	194	230	326	215	1,984
Tabloid Total	531	775	759	715	714	835	851	745	881	785	561	8,152
Broadsheet												
Daily Telegraph	125	180	168	91	143	120	249	226	268	225	107	1,902
The Independent	178	90	96	58	72	97	103	124	159	164	242	1,383
The Guardian	210	223	191	141	196	123	132	196	234	320	233	2,199
The Times	262	260	255	193	166	144	227	325	298	382	271	2,783
Broadsheet Total	775	753	710	483	577	484	711	871	959	1,091	853	8,267
OiBP Total	1,306	1,528	1,469	1,198	1,291	1,319	1,562	1,616	1,840	1,876	1,414	16,419

As can be seen from Table 3.1 the number of articles written about obesity between 2006 and 2016 fluctuates. In addition, there is only a difference of 115 between the broadsheet and tabloid totals, broadsheet newspapers publishing a total of 8,267 articles and tabloid newspapers publishing a total of 8,152 articles. However, as detailed by Table 3.1, the broadsheet majority, much like the total majority is not consistent and also fluctuates throughout the eleven-year period the data covers. With the exception of *The Independent*, there was a decline in the number of articles published about obesity in all of the newspapers in 2016. It can be argued that this is because of the contentious and controversial political climate, nationally with issues such as the beginning of Brexit and internationally with issues such as Donald Trump and the American presidential election largely setting the news agenda.

3.1.1 OiBP Collection and Clean Up

Using the database *LexisLibrary* and the search terms *obese* and *obesity*, every newspaper article written about obesity from 2006-2016 was collected. It was specified in the search that either *obese* or *obesity* needed to appear three or more times within the article to ensure that obesity was the primary topic under discussion in every article analysed. OiBP has a total of 16,419 articles and 9,750,159 words, making it one of the largest and most representative data sets analysed for the empirical investigation of the obesity media narrative, compared to the existing research which has been published in this field (see section 2.4). These articles appeared in the printed versions of the newspapers. Online versions of the newspapers were not included within this analysis because at the time of data collection, online versions of the newspapers were only available from February 2007 and not every online version of the newspapers under investigation appeared in the *LexisLibrary*. For example, until 2012, the only online newspaper represented was *The Telegraph*. In addition to this, online versions of *The Sun* and *The Times* did not appear in any of the searches, even in the most recent years.

Therefore, to avoid an imbalance in the data in favour of those with more productive online platforms, it was decided not to include the limited number of online articles which were available at the time of data collection.

Once OiBP had been built, the metadata within it had to be removed. This was performed using the search and replace software SarAnt (Anthony 2016) and regular expression.

Regular expression is a computer science language that allows users to process through large amounts of text to find desired words or word clusters and replace them with something that is preferred (Watt 2005: 1-2). It is an efficient method of cleaning data and eradicates the human error that is likely to occur when manually sifting through a large corpus (Watt 2005: 1). See extract 3.1 for an example of the metadata which appeared in conjunction with each newspaper article within the corpus.

Extract 3.1: Example of metadata which was removed

BYLINE: by EMMA WALL

SECTION: NEWS; 27

LENGTH: 147 words

LOAD-DATE: May 18, 2008

LANGUAGE: ENGLISH

GRAPHIC: SHAPING UP: It may be fun for adults, but experts say children should beware of Wii Fit's BMI ratings

PUBLICATION-TYPE: Newspaper

Copyright 2008 EXPRESS NEWSPAPERS

All Rights Reserved

OiBP is comprised of 16,419 articles, each of which contained the metadata shown in extract 3.1. In total, over one million words worth of metadata was removed from the corpus.

Therefore due to this high frequency, if the metadata had not been removed, it would have

compromised the word frequency and keyword lists, with words such as ‘by-line’ and ‘load-date’, which were not part of the articles but occurred after every one, occupying space within the top keywords. The lines of regular expression written and used in the removal of the metadata can be found in the appendices (appendix 10). After the removal of all of the metadata, the final word count for OiBP was 9,750,159 words.

3.1.2 *Personal Stories Sub-Corpus*

In the first two analysis chapters (chapters 4 and 5), the linguistic patterns analysed and discussed are pervasive throughout OiBP. To help with carrying out these analyses, OiBP was categorised into sub-corpora. The sub-corpora were based on the specific newspapers and the year in which they were published to determine the linguistic nuances and differences between different newspapers and to establish whether certain linguistic patterns were more or less salient in particular years. The final analysis chapter (chapter 6) required a different sub-corpus of OiBP. This chapter of the thesis focused on personal stories from members of the public and so a separate sub-corpus comprising only of articles containing personal stories was created. In order to carry out this analysis, the presence of personal stories within the corpus needed to be established and then extracted to create a sub-corpus. There was an indication that personal stories featured within the corpus as *word sketch* analyses (see section 3.2.1) carried out using Sketch Engine (Kilgarriff et al. 2014) revealed the lexical items *obesity* and *weight* had personal pronominal possessors (see Figure 3.1) The determiners *my*, *his* and *her*, when appearing directly before the nouns *obesity* and *weight* suggest that specific individuals are being written about. Therefore, these six collocate pairs were used to identify articles that featured personal stories.

Figure 3.1 Screen Shots from Sketch Engine - Pronominal Possessors of *Obesity* and *Weight*

↔ ⋮ 🔍 ✕	↔ ⋮ 🔍 ✕
pronominal possessors of "obesity"	pronominal possessors of "weight"
their ... of their obesity	their ... their weight
her ... her obesity	her ... her weight
his ... his obesity	my ... my weight
my ... rather than my obesity , which took	your ... your weight
our ... our obesity	his ... his weight
its ... its obesity	our ... our weight
	its ... its weight

Utilising this method, a total of 604 articles containing personal narratives were identified as containing a personal story and were collated to create the *personal stories* sub-corpus.

3.2 Analytical Approach

The methodology employed in this investigation was a Corpus-Assisted Critical Discourse Analysis. The specific approaches to research and theoretical frameworks utilised were Corpus Linguistics, primarily used to establish frequent and statistically significant lexical and grammatical patterns (see section 3.2.1) and Critical Discourse Analysis, which was the approach taken when carrying out the qualitative aspects of the analysis (see section 3.2.2).

Combining the two, exploits their strengths and mitigates against potential problems they each have when used alone, thereby strengthening the theoretical basis of both (Baker et al. 2008: 283) (see section 3.2.3).

3.2.1 Corpus Linguistics: Tools and Techniques

Within this research, Corpus Linguistic (henceforth referred to as CL) methods were used to establish keywords, analyse prevalent collocation and colligation patterns and examine the concordance lines of linguistic patterns of interest (see below for further details). The CL software used to perform these analyses was a combination of Wordsmith (Scott 2016) and Sketch Engine (Kilgariff et al. 2014). The two pieces of software were used in conjunction with one another because, while both have predominantly the same analytical features, there are some differences which were pertinent to this investigation. The first difference between the two is the frequency collocation measure in Wordsmith. In Sketch Engine, the collocation measures are statistics-based as opposed to frequency-based. As frequency is a distinct measure of prevalence, investigating frequent collocates was an important aspect of this analysis. The second difference is the *word sketch* function in Sketch Engine. The word sketch function is an enhanced collocation tool which grammatically tags corpora, organises lexical collocates into grammatical categories and identifies grammatical relationships between collocates (Baker, Gabrielatos and McEnery 2013b: 260). This was a particularly useful tool, surpassing the collocation analysis capabilities of Wordsmith. Utilising the word sketch function in Sketch Engine assisted the primary stages of analysis when overall themes within the corpus were being established (see section 4.1). In addition to this, word sketches were a key aspect of the analysis and data extraction, when building the personal stories sub-corpus for the final chapter of this thesis (see section 3.1.2). The reason both collocation tools were used was because while word sketch thrives in analytical capability by establishing each grammatical relation a word participates in, it does not allow for collocation windows or

spans (discussed in the proceeding paragraphs). Establishing an appropriate collocation span was paramount to certain aspects of the analysis, and therefore, both methods of collocation were used at different points throughout the analysis.

A common type of analysis in CL is establishing *key* lexical items. A keyword analysis aims to find out which lexical items within a corpus are both frequent and have a high saliency within the discourse under investigation (Baker 2006: 124). This is achieved by CL software, typically using the statistic log-likelihood, comparing the word frequencies in one corpus to the word frequencies in a different, reference corpus (Baker 2006: 124). Log-likelihood measures statistical significance which refers to the extent to which we can trust an observed frequency difference (Gabrielatos 2018: 229). Measuring keyness by statistical significance has been questioned by some as statistical significance scores are sensitive to the size of the data and increase as corpus word frequencies increase (Gabrielatos 2018: 237). Therefore, the larger the data, the higher the statistical significance scores, leading some to believe that statistical significance is not an accurate measure of keyness (Gabrielatos 2018: 233).

However, the term *keyword* is defined as ‘a word which occurs with unusual frequency in a given text by comparison with a reference corpus of some kind’ (Scott 1997: 236). Log-likelihood gives an accurate measure of how surprising or *unusual* an event is, even where it has occurred only once (Kilgariff 2001: 105). Therefore, it is a well-grounded statistical test and an effective measure for finding terms (Daille 1995: 45).

A reference corpus is typically representative of some norm and of multiple genres (Touri and Koteyko 2015: 605). In this research, the British National Corpus (BNC), was used. This corpus is comprised of 100 million words used in spoken and written language (Touri and Koteyko 2015: 605). The BNC was chosen as the reference corpus for this research because it is very large, representative of multiple genres and is considered a strong representation of general British English (Baker 2006: 97). Therefore, if a word occurs comparatively more

frequently in OiBP than it does in the BNC, an argument can be made that the word is significant within the obesity news discourse. The BNC is 26 years-old and therefore, certain words or topics which are more modern could account for some keyword results. This factor will be taken into account when interpreting the results. The results of a keyword analysis are presented as a list which is referred to as a keyword list. The lexical items on this list feature the lexical items which occur unusually more frequently in the corpus under examination compared to the reference corpus. The words are ordered by keyness, whereby the first word on the list is the most unusually frequent or key, and the remainder of the list is ordered accordingly (Baker, Hardie and McEnery 2006: 97-98). In addition to establishing specific words which are key, if there are lexical items on a keyword list which share semantic similarities and carry corresponding implications, this can indicate towards predominant themes which may exist within the discourse (McEnery, McGlashan and Love 2015: 2). This can serve as justification towards which specific lexical items warrant a further, more in-depth analysis because although keywords alone will not definitively reveal themes, they can direct towards important concepts in a text which may help ‘diagnose’ and ‘nominate’ central ideas around which the frame or theme is constructed. (Baker 2006: 125; Touri and Koteyko 2015: 605).

One type of analysis in which a further, more in-depth examination of a keyword can be carried is a collocation analysis. *Collocation* is the term used to describe the phenomena of words frequently co-occurring next to or near one another (Baker 2006: 96). Context is a key component in the analysis of embedded meanings within language, therefore, lexical items of interest, referred to as *nodes* must be compared to and examined alongside the words they co-occur with, referred to as *collocates* (Baker 2006: 96). Collocation is an effective way to establish semantic patterns because the collocates of a node can contribute towards its meaning. Furthering this, frequent patterns of collocations can reveal valuable insights into

societal attitudes, especially in terms of stereotypes (Caldas-Couldthard and Moon 2010: 99). Therefore, examining these patterns can be useful for demonstrating the existence of bias within discourse. For example, Baker, Hardie and McEnery discuss how ‘the strongest collocate in the British National Corpus (BNC) of the word *bystander* is *innocent*, suggesting that even in cases where *bystander* occurs without this collocate, the concept of innocence could still be implied’ (Baker, Hardie and McEnery 2006: 38). The habitual association between the semantic connotations of frequently co-occurring words is referred to as ‘semantic prosody’ (Louw 1993: 158). Since bias and ideologies are a central aspect of this research, extensive collocation analyses were carried out on lexical items and keywords of interest. Once the node of interest has been established, the collocation *span* or *window* must also be specified (Brezina, McEnery and Wattam 2015: 144). The collocation span refers to the ‘distance of the collocate from the node and can be as little as one word if there is an analytical interest, for instance, in the adjectives immediately preceding a noun, or as much as a span of four or five words on each side of the node, if there is an analytical interest in more general associations’ (Brezina, McEnery and Wattam 2015: 144). Within this analysis, different collocation spans were used for different aspects of the analysis and are all detailed in each analysis chapter.

When carrying out a collocation analysis, in addition to specifying an appropriate collocation span, an appropriate collocation measure also needs to be established. A collocation measure will determine the *collocability* or *collocational strength* between a node and its collocates (Gablasova, Brezina and McEnery 2017: 159). In CL, collocability can be predicated on statistical significance, frequency or both (Sinclair 1991: 170; Baker 2006: 102). The specific measure used is dependent on the objectives of the analysis. If a relationship of salience and statistical significance between a node and its collocates is the primary focus, statistically derived association measures, such as MI (mutual information), Z-Score, T-Score, Log-

Likelihood, Log Dice, and MI3 scores can be used (Xiao and McEnery 2006: 105). These statistics focus on the mutual co-occurrence between the node and the collocate (Gablasova, Brezina and McEnery 2017: 162). Mutual co-occurrence, also referred to as an *exclusive* relationship is a collocation relationship whereby two lexical items frequently co-occur with each other as opposed to only one collocating with the other. 'For instance, the noun *love* occurs frequently with the preposition *in* and therefore *in love* is an important 'chunk' in the English language (Brezina, McEnery and Wattam 2015: 140). However, *in* can also appear in front of many other nouns, such as *case*, *fact*, or *school*. Consequently, the relationship between *love* and *in* is not exclusive' (Brezina, McEnery and Wattam 2015: 140). The algorithms used in the statistical tests take into consideration the frequency of each word, their relative number of occurrences both next to and away from each other and calculate the probability of the words occurring with each other (Baker 2006: 101). Therefore, this method can circumvent the issue of non-exclusive collocate pairs to a greater extent than a frequency-based association measure (Baker 2006: 101). The disadvantage with some of these measures, MI in particular, is that it is linked to frequency in such a way that it unduly overvalues and rewards lower frequency combinations (Xiao and McEnery 2006: 105; Baker 2006: 102; Gablasova, Brezina and McEnery 2017: 164). Dependent on the objectives of the analysis, a low frequency collocation bias can be problematic. For example, in this analysis, which focuses on the representation of obesity and how prevalent language patterns contribute towards this representation, frequency is an important factor. If frequency, in addition to statistical significance is an important factor in the analysis then statistics such as MI3, Z-Score and Log-Likelihood, whose calculations take the frequency of collocates into account have been suggested (Baker 2006: 102). Finally, frequency alone can be used as a collocation measure and can determine relationships of prevalence and high frequency occurrences of collocates (Gablasova, Brezina and McEnery 2017: 159). Utilising frequency

as a measure has been scrutinised due to the fact that function words such as articles, prepositions and pronouns, which do not always reveal much of interest to an analysis centred around ideologies, can dominate the top of the list (Baker 2006: 100). As a result, a greater level of input from the analyst is required to establish linguistically interesting collocates (Baker 2006: 100). The collocational relationship is a complex one, each different collocation association measure has benefits and shortcomings dependent on the objectives of the research and no single association measure can capture all aspects (Brezina, McEnery and Wattam 2015: 144). If frequent repetition and prevalent lexical co-occurrence is an important aspect and a desired line of enquiry, then frequency can be used as the collocation measure (Sinclair 1991: 170). Therefore, in this investigation, frequency was used as the primary collocation measure because a main objective of the analysis was to analyse *frequent*, *pervasive* and *repetitive* linguistic patterns within the obesity media narrative. It is a common argument that repetition of language choices and the ideologies they represent within news discourse can result in the naturalisation, normalisation and validation of these ideologies within society (Fowler 1991: 92; van Dijk 1998: 216; Baker et al. 2008: 14; Fairclough 2013: 76). Therefore, high frequency collocate pairs were of considerable interest within this investigation. Despite the fact that there are some collocation measures such as MI3 and log-likelihood which take frequency in addition to saliency into consideration, frequency was the principal interest, and the decision was made to utilise frequency as the measure for the collocation analyses to ensure the most prevalent patterns were captured.

A similar and related phenomenon to collocation is *colligation*. This is a form of collocation ‘which involves relationships at the grammatical rather than the lexical level. For example, nouns tend to colligate with adjectives while verbs tend to colligate with adverbs’ (Baker, Hardie and McEnery 2006: 36). A CL tool which facilitates this type of analysis is the word sketch function in the software tool Sketch Engine (Kilgariff et al. 2014). The word sketch

identifies both lexical collocates and their grammatical relation to the node word, then organises and displays the collocates according to their grammatical categories (Kilgariff et al. 2010: 375). Word sketch has two colligation measures users can choose from which are LogDice and frequency. LogDice, similar to the statistics discussed previously, places less emphasis on frequency and gives a strong, high score to colligates which typically occur together and have an exclusive relationship (Sketch Engine 2019). Like the collocation analyses, frequency was used as a colligation measure when word sketch was used throughout this research. Word sketch allows for an efficient and synergised colligation and collocation analysis and organising collocates into grammatical categories can elucidate patterns and themes within discourse. Utilising a computerised method as opposed to manually organising lexical collocates into grammatical categories removes the chance of human error from this process.

Once keywords, collocation and colligation patterns of interest have been established, an additional, further analytical aspect of CL which can be used to supplement the initial findings is a *concordance* analysis. A concordance analysis is the intersection of quantitative and qualitative research methods and is an effective technique which allows researchers to closer examine their data (Baker 2006: 71). The term *concordance* refers to a collection of the occurrences of a word or word cluster, each in its own textual environment (Sinclair 1991: 32). The textual environment constitutes a window of text, typically a few words to the left and right of the linguistic item under investigation (Baker, Hardie and McEnery 2006: 43). This short format is referred to as a *Key Word in Context* (KWIC) format (Sinclair 1991: 32). Once a potential line of enquiry has been established at the KWIC level, a longer sentence context analysis and even a discourse context analysis can be explored (Sinclair 1991: 43). The primary objective of this type of analysis is to identify patterns of language use, based on repetitions, which could provide insights into the discourse under examination

(Baker 2006: 76). Concordance lines are generated by CL software and allow the analyst to shift backward and forward between instances of the language under examination in its immediate textual surrounding and the whole texts themselves (Tourì and Koteyko 2015: 605). In addition to analysing the text surrounding the language of interest, a wider contextual analysis transcending the immediate co-text was carried out. This was to facilitate arguments made concerning the ideological basis behind certain language choices and the implications these choices could have on readers and society overall. The framework within which this aspect of the analysis was performed was Critical Discourse Analysis.

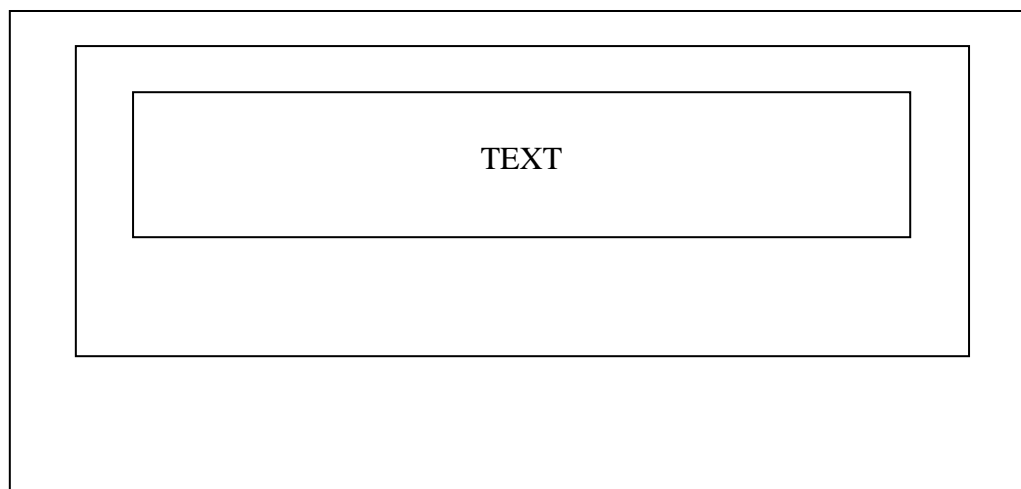
3.2.2 Critical Discourse Analysis

Critical Discourse Analysis (henceforth referred to as CDA) is a multidisciplinary research framework, the primary objective being to identify ideologically charged language and examine its significance in social relations and social contexts (Fairclough 2010: 231). To achieve this, multiple factors, including and in addition to the language under examination are featured in a CDA analysis. This can include analysing the relationship between language and sociological variables such as, power, social hierarchies, gender, race, sexuality, culture and religion (Fairclough 2010: 231). Questions surrounding the role of the speaker/writer and how they represent themselves, others and whether they have any underlying biases which could influence the linguistic choices are also asked (Bloor and Bloor 2007: 12). Discursive contextual factors such as the place in which a text is published, or the intended audience must be incorporated into the analysis and finally, social contextual factors such as politics and interpersonal relationships must also be factored in (Bloor and Bloor 2007: 12). A combined analysis of these factors can generate a balanced, representative and reliable analysis about language, society and ideology (Fairclough 2010: 9). CDA has been applied to multiple fields of research, analysing language in a wide variety of contexts such as the media (Fowler 1991; van Dijk 1988), politics (Flowerdew 2002; Charteris-Black 2014), the law

(Andrus 2011; Potts and Weare 2017) and education (Xiong & Qian 2012; Harman, Ahn and Bogue 2016). Due to the fact that CDA incorporates and can be applied to many disciplines outside of linguistics, multiple approaches have been developed. The specific approach taken is dependent on the critical goals of the research and the discourse analyst (van Dijk 1993a: 252). The critical goals of this research are to identify how weight and obesity are conceptualised in British news media and to ask questions about how these conceptualisations affect cultural ideologies towards these phenomena. Therefore, the intersection of weight, the media conceptualisation of weight and issues such as politics, health, social inequalities and science were predominant aspects of the contextual analysis. Based on the primary aims of this research, a combination of the dialectal relational approach to CDA (Fairclough 1992) and the discourse historical approach to CDA (Wodak 2001) has been utilised in this research (discussed below).

Fairclough argues that the primary focus of CDA is on ‘discursive aspects of power relations and inequalities, on dialectal relations between discourse and power and their effects on other relations within social processes’ (Fairclough 2010: 8). An additional primary focal point in Fairclough’s dialectal relational approach to CDA is addressing ‘social wrongs in their discursive aspects and proposing possible ways of righting or mitigating them’ (Fairclough 2010: 10-11). He proposes a three-dimensional approach in which to achieve this. These dimensions can be found in Figure 3.2.

Figure 3.2: Fairclough's Three-Dimensional Approach to CDA.



Fairclough (1992: 73)

As detailed by Figure 3.2, the three dimensions are *text*, *discursive practice* and *social practice*. The boundaries between these dimensions are porous and there can be some overlap, but Fairclough presents the fundamental characteristics of each one (Fairclough 1992: 74). The textual dimension refers to the analysis of the linguistic features of the text, including individual lexical items, word clusters, clauses and sentences. (Fairclough 1992: 75). The textual dimension in this analysis featured prevalent patterns of metaphors (see chapter 4), recontextualised reported speech and reporting verbs (see chapter 5) and verbs, adjectives, pronouns and presupposition triggers (see chapter 6). Examining the discursive practices of discourse involves analysing the discursive contextual factors. These include elements such as the production and consumption of the discourse, which involve considerations of intended audiences, writers/speakers and the place of publication for written discourse (Fairclough 1992: 71). In this analysis the discursive practices included aspects such as the type of newspaper and the extent to which capitalism, newsworthiness and sensationalism affected the linguistic choices. In addition, chapter 5 is focused on reported speech, therefore journalistic practices surrounding source selections are explored. These are

examples of discursive practices and, as detailed in the analysis chapters, they can have a significant impact on the selection of specific linguistic features and can also impact how these features will be received by audiences (Fairclough 1992: 71). The final dimension to this approach is social practice. This involves investigating how the language under examination affects, adheres to and challenges societal structures such as politics and social hierarchies. Conversely, the social practice dimension also involves investigating how societal structures like politics and social hierarchies have influenced the language being analysed (Fairclough 1992: 75). An example of the social practice aspect of analysis from this research, which can be found in each analysis chapter, is the discussions surrounding weight bias and weight stigma. As detailed in section 2.1 of the literature review, the dominant societal stereotypes about obesity and individuals with obesity include laziness, lack of will power, a lack of moral character, poor personal hygiene, low levels of intelligence and unattractiveness (Puhl and Brownell 2001: 800). The relationship between all of the language analysed in this investigation to these stereotypes and character traits and vice versa is a predominant aspect of analysis in this research. In addition to these three dimensions proposed by Fairclough, aspects of Wodak's (2001) Discourse Historical Approach to CDA were also implemented into the analysis.

The discourse historical approach (DHA) to CDA was developed by Ruth Wodak and has many similarities to the dialectal relational approach. For example, in accordance with Fairclough, Wodak argues that there is a dialectal relationship between texts and their discursive and social practices and therefore, these aspects of discourse should be understood, explained and critiqued (Wodak 2001: 65; Wodak 2011: 627). In contrast to Fairclough's views on CDA, Wodak places less emphasis on evaluating what is socially 'right' or 'wrong', arguing that this can create a biased interpretation of results (Wodak 2001: 65). To mitigate this, she argues more emphasis should be placed on why certain interpretations of discursive

events seem more valid than others (Wodak 2001: 65). Furthering this argument, Wodak proposes a triangulated approach whereby, in addition to the social and discursive properties of a text, the historical properties of the text should feature in the analysis (Wodak 2001: 65),

‘The discourse historical approach attempts to integrate a large quantity of available knowledge about the historical sources and the background of the social and political fields in which discursive events are embedded’

(Wodak 2001: 65).

Incorporating a historical element into the approach can increase the richness of the interpretations of power relations between language and social structures because the way language meanings are shaped discursively is realised (Wodak 2011: 628). The interdiscursive relationship between texts can arguably be better analysed with a DHA approach. Interdiscursivity refers to when arguments and ideas from one topic are taken and recontextualised into a separate topic (Titscher et al. 2000: 150). For example, when issues relating to race and immigration are recontextualised and reproduced into arguments about unemployment (Wodak 2001: 66). Weight and obesity are topics which sit at the intersection of science, health and sociology and they are also phenomena which have been politicised. Therefore, an aspect of the analysis involves examining if and which of the historic scientific and sociological ideologies surrounding weight are reproduced in British news media. For example, a large portion of the contextual analysis in chapter 5 focuses on scientific debates surrounding obesity and medical conditions associated with it, how they have developed in the recent decades, how they are recontextualised and reproduced in newspaper reports and how journalists correlate them to issues related to government, politics and social justice. Fairclough’s dialectal relational approach to CDA focuses on the relationship between language and social theory and aims to right social inequalities and injustices (Fairclough 1992). Wodak’s DHA approach to CDA focuses on examining how past events have changed

and shaped the way in which language is used (Wodak 2001). Within this research, all of these aspects of analysis are explored to create a full understanding of how newspapers conceptualise weight, where the conceptualisations originate, it condemns the stigmatisation of weight and explores ways in which this can begin to be rectified.

3.2.3 Corpus-Assisted Critical Discourse Analysis

CDA is an analytical approach which has come under some scrutiny, particularly in relation to the susceptibility of bias influencing the analysis. The first criticism of bias concentrates on the discourse analyst. As discussed in section 3.3.2, CDA is centred around inequality, ideology and power, and practitioners are explicit in their socio-political stance with regards to the subject of their analysis (Baker et al. 2008: 283). Therefore, it has been argued that analyses which incorporate CDA produce results which are an ideological interpretation of discourse as opposed to an analysis, and the analyst is merely making assumptions based on their own interpretations of the world (Widdowson 1995: 157; Fang 2011: 877). van Dijk argues that ‘CDA is biased and proud of it’ (van Dijk 2001: 96). He argues that biased scholarship is not inherently bad because the standard at which it is held is higher, therefore, critical research must be rigorous in order to be accepted (van Dijk 2001: 96). In addition, as detailed in section 3.3.2, Wodak argues that emphasising why certain interpretations of discursive events seem more valid than others is a crucial aspect of critical analyses (Wodak 2001: 65). Therefore, while CDA practitioners may have biased views, these views are made transparent, the analysis is rigorous with a wide variety of contextual and historical factors taken into consideration and multiple interpretations of the results are considered and discussed. Critical analyses do not claim to be ideologically neutral and unbiased, but it can be argued that the complex and multidisciplinary nature of CDA produces results and observations which are socially useful as well as scholarly reliable (van Dijk 2001: 96).

The second criticism surrounding potential bias focuses on the data. CDA is a qualitative approach to research and as such, some analyses can feature small data sets which are unrepresentative of the discourse genre under discussion (Stubbs 1994: 204). McEnery and Hardie (2012: 17) argue that small data sets generate generalised observations as opposed to rigorous results because claims regarding the relationship between language and society cannot be made when the bank of evidence is insufficient in size and unrepresentative of the type of language being analysed. In addition, practitioners of CDA have been scrutinised for ‘cherry picking data’ to aid their preconceived notions and hypotheses regarding the discourse they are analysing (Koller and Mautner 2004: 225). A way in which to circumvent this issue is to combine quantitative and qualitative approaches to research (Meyer 2002: 123). Incorporating Corpus Linguistics (CL) into the methodology and complementing the qualitative with a more quantitative approach, not only allows a greater distance to be preserved between observer and data but also enables a far greater amount of data to be contemplated (Partington 2006: 268). CL methods allow for the analysis of millions of words, creating an abundance of evidence, boosting the empirical credence of analyses and offering no reason or motivation for selecting some evidence and ignoring the rest (Tognini-Bonelli 2001: 50; Mautner 2007: 54). Therefore, combining CL and CDA can mitigate the analyst and data biases associated with CDA and representative and objective arguments concerning language, society and ideology can be shaped.

In addition to mitigating some of the critiques of CDA, a Corpus-Assisted Critical Discourse Analysis can mitigate some critiques associated with CL. It has been argued that in isolation, CL cannot uncover the true meaning behind language use (Teubert and Cermakova 2004: 127). This is because CL can reveal the key words, collocations and concordance patterns which are all statistically significant, but it cannot facilitate the discussions around why they are contextually and societally relevant (Teubert and Cermakova 2004: 151). Results are

divorced from the overall context of the discourse and consequently, aspects such as the author, their illocutionary intentions and their intended audience are neglected (Partington 1998: 145). In order to make valid statements about patterns of lexical and grammatical phenomena at a discourse level a broader contextual examination is required (Adolphs 2006: 91). When CL is paired with a multidisciplinary qualitative analytical framework such as CDA, which examines wider discursive and contextual features of the corpus, these problematic aspects are alleviated. Exploring a corpus qualitatively allows the analyst to provide descriptive information about the results that cannot be presented strictly quantitatively (Meyer 2002: 125). The combination of CL and CDA can be approached in a variety of ways. For example, ‘CL processes can help quantify discursual phenomena already recognized in CDA; that is, establish their absolute and relative frequencies in the corpus’ (Baker et al. 2008: 285). As discussed, CDA practitioners can have preconceived notions regarding the linguistic contents of their data. CL techniques can be used to search for specific words, word clusters, metaphorical constructions or representation strategies for example, to establish and quantify any preconceived notions the analyst may have. An example of this can be found in Semino et al.’s (2017) analysis into the use of violence and journey metaphors used by and about patients with cancer. Their analysis focused on a particular linguistic phenomenon and began with a qualitative analysis on a small-scale sample of their corpus to identify some specific metaphorical constructions within their data (Semino et al. 2017: 61). Once the specific metaphors had been identified, CL techniques were implemented to identify and quantify the use of these metaphors in the whole, large-scale corpus (Semino et al. 2017: 61). Alternatively, Baker et al. (2008: 284) argue that ‘CL techniques can provide a map of the corpus, pinpointing areas of interest for a subsequent close analysis’. In this approach, the theoretical framework of CDA is used to interpret and explain the results highlighted through CL methods. This was the approach taken in this

research. The analysis began with a quantitative approach, harnessing CL software to identify salient keywords, collocation, colligation and concordance patterns. These patterns were used as a ‘point of entry’ (Baker 2010: 138) for a further qualitative analysis and were then critically examined in conjunction with discursive, contextual and historical factors to provide a rigorous analysis and an accurate interpretation about how the language found in the obesity media narrative affects societal ideologies towards weight. Combining CL and CDA in this manner largely bypassed the subjective analysis CDA in isolation can lead to and avoided the statistically significant but contextually irrelevant analysis CL in isolation can lead to.

3.3 Frameworks of Analysis

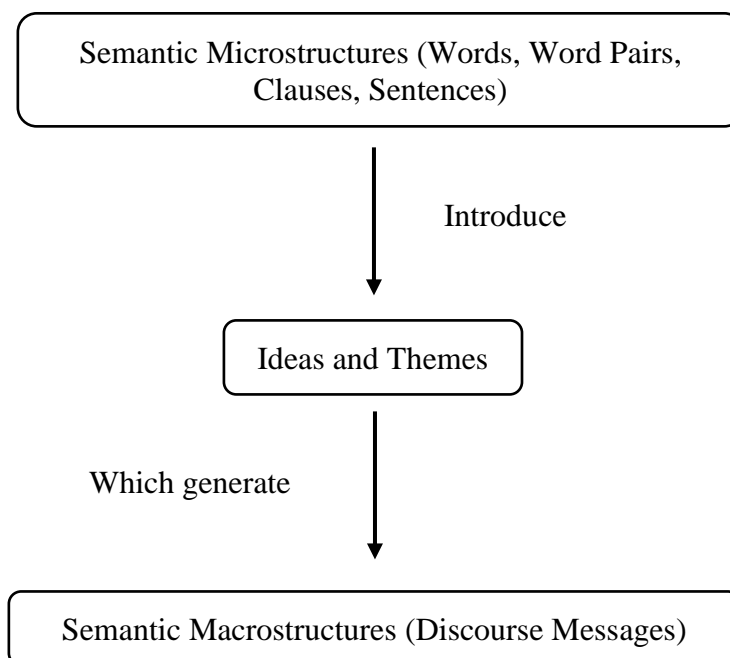
The overall framework of the qualitative analysis in this thesis comprises three main components; van Dijk’s (1980) notion of semantic macrostructures, Reisigl and Wodak’s (2001) five discursive strategies of representation and van Dijk’s (1998) ideological principles of representation.

3.3.1 Macrostructures

The framework of analysis is the same in each analysis chapter, whereby prevalent patterns of the micro-linguistic aspects of the corpus are identified and then analysed against a broader contextual framework to establish their effect on weight stigma, social representations and social inequality. van Dijk (1993b: 28) maintains that two predominant ways in which the discursive reproduction of social inequality in discourse can be identified is through the analysis of the semantic microstructures and semantic macrostructures. *Semantic microstructures* are ‘local level’ semantic structures such as words, word pairs, clauses, sentences and connections between sentences (van Dijk 1980: 29). *Semantic macrostructures* refer to the broad messages within a text and are distinguished and generated by semantic microstructures and the ideas and notions they introduce (van Dijk 1980: 13; van Dijk 1993b:

28). Figure 3.3 is a diagram demonstrating the micro and macrostructure relationship, created for this thesis, adapted from van Dijk's arguments.

Figure 3.3: Semantic Microstructures and Macrostructures



Analysing how the semantic microstructures inform the semantic macrostructures will facilitate a primary aim of CDA, which is to explore the relationship between language and sociological variables such as, power, social hierarchies, gender, race, sexuality, culture and religion (Fairclough 2010: 231). The semantic microstructures of interest in this research were identified in the quantitative, CL portion of the analysis. This aspect of the analysis, as detailed in section 3.2.1 and 3.2.3, explored salient keywords and their collocations, colligations and also included an analysis of their concordance lines. The specific microstructures investigated in this research include metaphors (chapter 4), scientific and expert social actors and the reporting verbs which collocate with them (chapter 5) and verbs, pronouns, adjectives and presupposition triggers (chapter 6). The discussions surrounding these microstructures focus on the ideas and notions they introduce, the role they play in enforcing rhetorical strategies of representation (section 3.3.2 and 3.3.3) and the effect they

have on the semantic macrostructures of the corpus. van Dijk argues that the analysis of semantic macrostructures in discourse is important because readers of a text or news article will not remember it in its entirety, but they will create a mental abstract or a summary of it on the basis of the macrostructures (van Dijk 1980: 10). Therefore, establishing macrostructures can facilitate an investigation and an understanding into how readers and audiences will interpret the key messages within the articles. The macrostructures in this research were identified through a combination of CL and CDA. Prevalent themes were identified through the keyword analyses and through word sketches of the lexical item's *obesity* and *weight* (see section 4.1). In addition, the qualitative analysis of the pervasive microstructures found in each chapter led to the same connotations and inferences, which is argued generate the same semantic macrostructures (full discussions in chapters 4, 5 and 6). The discussion surrounding the semantic macrostructures involves examining the extent to which they misinform readers on matters concerning weight and health, and the extent to which they perpetuate weight bias and social exclusion.

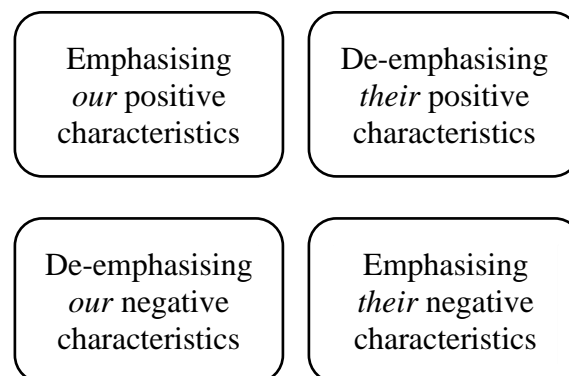
In section 2.4 of the literature review, much of the previous research into obesity reporting in news discourse has used frame analysis as an analytical framework. Their results discussed the prevalence of frames such as *behavioural*, within which individual behaviours were blamed for obesity, frames such as *health* within which the relationship between obesity and other health conditions was highlighted, and *environmental* frames within which the environmental factors that affect weight and obesity were highlighted. Framing refers to making aspects of reality salient in a text 'in such a way as to promote a particular problem definition, causal interpretation, moral evaluation, and/or treatment recommendation' (Entman 1993: 52). Semantic macrostructures, as opposed to frame analysis was chosen for this research because, although the two bear similarities, they differ in terms of specificity. Semantic macrostructures refer to the key messages within a text (van Dijk 1980: 13). These

key messages which readers will absorb from the language used, as opposed to the broader frames within which they are situated, was the primary interest in this research.

3.3.2 Ideological Square

The discursive reproduction of power relations, power structures and their effects on other relations within social processes is another key component of CDA (Fairclough 2010: 8). van Dijk (1998: 267) argues that a common strategy of the discursive reproduction of power relations is one of ‘positive self-representation and negative other representation’. He maintains that the specific linguistic strategies used to represent social actors and social groups in discourse subsidise four main moves (van Dijk 1998: 267). He proposes a model to encapsulate these four moves and refers to it as an ‘ideological square’ (van Dijk 1998: 267). Figure 3.4 is an example of the ideological square.

Figure 3.4: van Dijk’s Ideological Square



van Dijk (1998: 267)

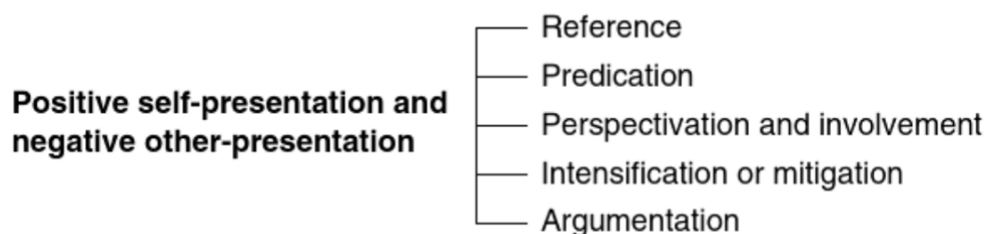
The ideological square operates under the principle that ‘biased discourses will tend to be very detailed about *their* bad acts and *our* good acts and quite abstract and general about *their* good acts and *our* bad ones’ (van Dijk 1998: 268). Each pronoun represents an *in* group and an *out* group, the *out* group typically being the marginalised group. The social actors included within the *our/their* pronominal group is interchangeable and dependent on the discourse under examination (van Dijk 1998: 268). As demonstrated in section 2.2 of the literature review, though not overtly referenced, this principle has been supported in a multitude of

linguistic studies into the representation of many marginalised social groups including, refugees, asylum seekers, individuals living in poverty and claiming benefits, members of the LGBTQ+ community, women and people of colour. This research centres around the representation of weight and people with obesity. Therefore, in addition to identifying the semantic macrostructures, examinations into van Dijk's ideological principles of representation featured as a predominant aspect of the qualitative analysis. Through a variety of different linguistic microstructures, the extent to which the phenomena of weight and people with obesity are othered and placed into an *in* or *out* group is explored. In addition, the way in which powerful and elite groups such as the government and scientific experts are positioned in terms of people with obesity is also explored through van Dijk's ideological square framework.

3.3.3 Self and Other Representation Strategies

In addition to van Dijk's principles of positive and negative representation, specific linguistic rhetorical strategies of self and other representation also featured as a predominant aspect of the qualitative analysis and discussion in this research. Reisigl and Wodak (2001: 46) highlight five different linguistic or rhetorical means by which individuals and social groups can be discursively discriminated against. Their five-pronged strategies of representation can be found in Figure 3.5.

Figure 3.5: Reisigl and Wodak's Five-Pronged Strategy of Representation



(Reisigl and Wodak 2001: 46)

The first strategy is the *reference* by which a writer or a speaker constructs and represents social actors (Reisigl and Wodak 2001: 45). This specifically refers to how individuals and social groups are linguistically referred to. In the case of discriminatory discourse, these can include derogatory and offensive terms commonly associated with the social group under discussion. In terms of people with obesity, body meronyms such as *fatty* and *fatso* are common slurs which, even in isolation can be used disparagingly (Reisigl and Wodak 2001: 49). In addition, referential strategies can be used to positively represent individuals and social groups. For example, in chapter 5, the specific titles given to scientific and expert sources is discussed extensively and the extent to which these titles affect the validity and persuasiveness of their arguments is explored. ‘Once constructed or identified, the social actors as individuals, group members or groups are linguistically provided with predication’ (Reisigl and Wodak 2001: 45). *Predication* strategies assign qualities and characterise social actors. They are closely related to reference strategies, the boundaries between the two are not entirely absolute (Reisigl and Wodak 2001: 54). In discriminatory discourse, predication strategies can include characterisations which are stereotypical and negative and can be realised through a variety of linguistic microstructures such as adjectives, nouns, pronouns, relative clauses and metaphors (Reisigl and Wodak 2001: 54). Predication strategies were the most prevalent in the results of this research, appearing in every aspect of the analysis. Each chapter explores how a variety of linguistic features are used to create negative characteristics, stereotypical evaluations and inaccurate attributions for individuals with obesity. In addition, chapters 4 and 5 investigate the differences in the predication strategies utilised to conceptualise and characterise the powerful and elite *in* group, which include social actors such as scientists and government officials, compared to the discriminated against *out* group, people with obesity.

The third strategy is *perspectivation and involvement*, ‘by means of which speakers express their involvement in the discourse, and position their point of view in the reporting, description, narration or quotation of discriminatory events or utterances’ (Reisigl and Wodak 2001: 54). Unlike predication, this strategy is not overt, and the exact perspective of the journalists was difficult to determine from the linguistic evidence. However, it is argued that the consistent nature of semantic macrostructures speaks to the overall perspective of the newspapers, as obesity and weight are consistently negatively represented by them. The fourth strategy put forward by Reisigl and Wodak is *intensification and mitigation*. These refer to the sharpening and toning down of certain aspects of an issue in order to generate a particular identity for social actors and groups (Reisigl and Wodak 2001: 45). This strategy, although not overtly referenced, was a common feature of the results in research examining the representation of science and health in news media (see section 2.3). Chapter 5 focuses on reported speech from scientists and experts who frequently discuss their research into areas related to obesity and weight. An aspect of the qualitative analysis involved a systematic review of the scientific literature surrounding obesity and weight to determine if a fair representation of the facts was presented to the public in the articles. Finally, the *argumentation* strategy refers to the way in which these constructs and arguably, the social inclusion, exclusion, discrimination and celebration of social groups are justified (Reisigl and Wodak 2001: 45). Throughout the corpus, in each aspect of linguistic analysis, the argumentation strategies could be seen in the semantic macrostructures. These macrostructures portray weight negatively and it is argued that the ideologies they represent are used as justification for discrimination.

Each analysis chapter in this thesis focuses on different linguistic phenomena but have the same overarching aim of exploring how weight and people with obesity are represented. This aim is fulfilled by identifying which specific strategies of representation can be found and

which aspects of weight and characteristics of people with obesity are emphasised or de-emphasised. Then finally, discussions surrounding how all of the evidence, quantitative and qualitative, shape and contribute towards the semantic macrostructures of the discourse are opened and questions about how this affects the representation of weight and obesity are explored.

4. Fighting the Obesity Epidemic: The Metaphorical Conceptualisation of Obesity

4.1 Analysis Introduction: The Results Which Will Inform all Analyses

The main aim of this research is to explore the linguistic representation of obesity in British newspapers and to examine the extent to which this representation stigmatises weight and people with obesity. As discussed in section 3.2.3, the first aspect of the analysis involves utilising Corpus Linguistic (CL) methods to find a ‘point of entry’ into OiBP for a further qualitative analysis (Baker 2010: 138). Therefore, a keyword list for OiBP was generated to identify lexical items and potential concepts and themes of interest for the subsequent analyses in the following chapters. The top 50 keywords can be found in Table 4.1.

The lexical items *obesity* and *obese* were the search terms used when the articles for OiBP were selected, therefore their presence on the keyword list is unsurprising. However, many of the lexical items on the list share semantic similarities and indicate towards some clear themes which could represent the central ideologies within OiBP. Table 4.2 contains the semantic categories which have been determined from the top 50 keywords. These semantic categories are derived from the lexical items featured on the keyword list and are not predetermined categories.

Table 4.1: Top 50 Keywords in OiBP

Keyword	Frequency	Keyword	Frequency
#1 obesity	49,343	#26 per	21,629
#2 obese	24,011	#27 foods	6,960
#3 fat	26,760	#28 BMI	4,824
#4 weight	29,341	#29 UK	12,214
#5 health	36,248	#30 exercise	9,552
#6 food	31,006	#31 heart	10,671
#7 overweight	16,683	#32 surgery	6,167
#8 page	23,838	#33 kids	6,787
#9 sugar	18,805	#34 says	15,903
#10 diabetes	14,351	#35 study	11,911
#11 edition	15,561	#36 junk	4,383
#12 children	29,348	#37 childhood	5,368
#13 diet	13,887	#38 year	20,599
#14 NHS	11,945	#39 adults	5,524
#15 healthy	12,125	#40 epidemic	3,671
#16 eating	11,692	#41 sugary	3,299
#17 cancer	10,452	#42 women	13,068
#18 risk	13,675	#43 researchers	4,775
#19 drinks	8,966	#44 unhealthy	3,283
#20 eat	11,316	#45 experts	4,944
#21 calories	6,796	#46 calorie	3,220
#22 disease	10,669	#47 Dr	7,868
#23 London	17,567	#48 lifestyle	3,774
#24 people	33,590	#49 healthier	3,099
#25 percent	18,410	#50 parents	8,523

Table 4.2: Keywords Organised into Semantic Categories.

Semantic Category	Keywords
Weight Reference	<i>obesity, weight, obese, fat, overweight</i>
Health	<i>diabetes, NHS, healthy, cancer, disease, BMI, exercise, heart, surgery, epidemic, unhealthier, healthier, lifestyle</i>
Food/Drink	<i>food, fat, sugar, diet, eating, drinks, eat, calories, foods, sugary, junk, calorie</i>
Reference to Social Actor/Group/Source	<i>children, childhood, people, kids, says, study, adults, women, researchers, experts, Dr, parents</i>
Prevalence	<i>percent, per, epidemic</i>
Fear	<i>risk, epidemic</i>
Place	<i>London, UK</i>

The primary semantic categories determined from the keyword list include, *weight reference*, *health*, *food/drink consumption*, *reference to social actor/source*, *prevalence*, *fear* and *place*.

The lexical item *epidemic* appears in three categories, *health*, *prevalence* and *risk* because the meaning of *epidemic*, the ‘wide-spreading occurrence of an infectious disease’ (Hermiston 2010: 361), has connotations relating to health, prevalence and risk. As having obesity as a primary discussion point was a prerequisite in the selection of articles for this research, the *weight reference* semantic category and themes of obesity and weight are expected. However, in addition to this, the keyword list indicates that some of the central ideologies within OiBP relate to health risks associated with obesity, the prevalence of obesity, stereotypical behaviours associated with obesity such as eating *sugary* foods and *junk* food, lexical items such as *calorie*, *surgery* and *healthier* indicate that weight loss could be a central theme and

finally, it indicates that external sources such as *researchers* and *experts* are referenced and quoted.

To gain a better idea of what the central ideologies and semantic macrostructures relating to obesity in OiBP could be, and to fulfil the primary aim of this research, which is to analyse the representation of obesity, a word sketch analysis of the lexical item *obesity* was carried out. As discussed in section 3.2.1 of the methodology, a word sketch is an enhanced collocation tool within Sketch Engine which organises lexical collocates into grammatical categories (Sketch Engine 2019). The collocation measure used was frequency and Sketch Engine displays the twelve most frequent lexical collocates in each grammatical category and the frequency with which each collocate appears in each specific grammatical context. For example, the lexical item *childhood* modifies *obesity* 3,051 times in OiBP. Table 4.3 displays the results of the *obesity* word sketch analysis.

Baker et al. (2008: 21-22) argue that it is not always the verbatim collocations in newspapers readers will remember, but the semantic implications of the collocate pairs, particularly if multiple collocate pairs have the same or similar semantic implications. In accordance with this, Hoey (2005: 12) argues that repeated collocations in discourse become part of the cohesion of a text. These collocations become a natural aspect of the discourse and a reader may grow to expect these lexical combinations.

Table 4.3: *Obesity* Sketch Engine Results

Grammatical Category	Lexical Items
Modifiers of Obesity	<i>childhood</i> (n= 3,051), <i>child</i> (n= 923), <i>morbid</i> (n= 118), <i>severe</i> (n= 100), <i>fight</i> (n= 86), <i>maternal</i> (n= 81), <i>abdominal</i> (n= 69), <i>smoking</i> (n= 68), <i>adult</i> (n= 64), <i>diabetes</i> (n= 61), <i>journal</i> (n= 60), <i>disease</i> (n= 59)
Nouns Modified by Obesity	<i>epidemic</i> (n= 2,120), <i>crisis</i> (n= 1,741), <i>rate</i> (n= 1,192), <i>level</i> (n= 816), <i>problem</i> (n= 750), <i>strategy</i> (n= 497), <i>expert</i> (n= 270), <i>diabetes</i> (n= 201), <i>surgery</i> (n= 169), <i>drug</i> (n= 140), <i>disease</i> (n= 108), <i>timebomb</i> (n= 94)
Verbs with Obesity as Object	<i>tackle</i> (n= 1,579), <i>reduce</i> (n= 376), <i>combat</i> (n= 370), <i>prevent</i> (n= 313), <i>treat</i> (n= 305), <i>fight</i> (n= 302), <i>be</i> (n= 287), <i>cause</i> (n= 248), <i>say</i> (n= 218), <i>rise</i> (n= 201), <i>link</i> (n= 200), <i>cut</i> (n= 175)
Verbs with Obesity as Subject	<i>be</i> (n= 4,391), <i>have</i> (n= 877), <i>cause</i> (n= 363), <i>increase</i> (n= 197), <i>cost</i> (n= 180), <i>become</i> (n= 154), <i>rise</i> (n= 138), <i>affect</i> (n= 88), <i>reach</i> (n= 69), <i>lead</i> (n= 63), <i>continue</i> (n= 59), <i>double</i> (n= 58)
Obesity and/or	<i>diabetes</i> (n= 889), <i>disease</i> (n= 458), <i>smoking</i> (n= 230), <i>overweight</i> (n= 205), <i>diet</i> (n= 189), <i>type</i> (n= 148), <i>health</i> (n= 139), <i>problem</i> (n= 123), <i>alcohol</i> (n= 121), <i>cancer</i> (n= 115), <i>pressure</i> (n= 111), <i>illness</i> (n= 109)
Adjective Predicates of Obesity	<i>high</i> (n= 46), <i>due</i> (n= 33), <i>such</i> (n= 32), <i>bad</i> (n= 30), <i>likely</i> (n= 28), <i>prevalent</i> (n= 25), <i>more</i> (n= 24), <i>common</i> (n= 23), <i>responsible</i> (n= 17), <i>complex</i> (n= 15), <i>dangerous</i> (n= 15), <i>big</i> (n= 14)
Obesity is a	<i>problem</i> (n= 218), <i>factor</i> (n= 135), <i>issue</i> (n= 89), <i>disease</i> (n= 63), <i>threat</i> (n= 55), <i>cause</i> (n= 52), <i>epidemic</i> (n= 27), <i>priority</i> (n= 27), <i>disability</i> (n= 26), <i>illness</i> (n= 25), <i>challenge</i> (n= 24), <i>condition</i> (n= 23)
Possessors of Obesity	<i>child</i> (n= 55), <i>Kaltoft</i> (n= 9), <i>Britain</i> (n= 8)
Pronominal Possessors of Obesity	<i>my</i> (n= 119), <i>their</i> (n= 118), <i>her</i> (n= 69), <i>his</i> (n= 69), <i>our</i> (n= 10), <i>its</i> (n= 8)

The collocations in Table 4.3 demonstrate how negative conceptualisations of obesity are prevalent in OiBP and several potential themes and semantic macrostructures begin to emerge. In terms of the lexical items which modify and are modified by *obesity*, adjectives such as *morbid* and *severe*, verbs such as *fight* and nouns such as *diabetes*, *disease*, *epidemic*, *crisis*, *problem* and *timebomb* all have negative semantic connotations, which arguably attach themselves to the concept of obesity through repeated use, creating a negative semantic prosody for the issue of obesity. In addition to having negative semantic connotations, many of these lexical items are in the semantic field of medicine, implicating that a theme and a potential semantic macrostructure in this corpus could be related to the medical conditions associated with obesity. Medically related lexical items are also present on the keyword list and in terms of the word sketch analysis, another grammatical category which indicates this is the *obesity and/or* category. Many of the lexical items in this field including *diabetes*, *disease*, *health*, *cancer* and *illness* have negative medical connotations, indicating that a narrative of fear could be perpetuated through these collocation patterns. An indication of a second theme and potential semantic macrostructure in OiBP relates to actions taken in response to obesity. This is evident from some of the nouns modified by obesity such as *strategy*, *surgery* and *drug* and is implied by the nouns, *epidemic*, *crisis* and *problem*. Although *epidemic*, *crisis* and *problem* do not overtly connote actions, the implication of problematic concepts, (which *epidemics*, *crises* and *problems* are), is that they need to be fixed. In addition, this action and intervention theme is evident from the verbs which occur with *obesity*, particularly those which have *obesity* as their object. *Tackle*, *reduce*, *combat*, *prevent*, *treat*, *fight* and *cut* are some of the most frequent verbs which represent actions to be carried out against obesity. In addition to enforcing the notion that obesity requires action and intervention, the semantic connotations of some of the verbs such as *cut* and *fight* are extreme and violent and the list demonstrates a pattern of war-themed metaphorical constructions with

verbs such as *tackle*, *combat* and *fight*. The verbs which collocate with *obesity* when it is the subject of the sentence such as *cost*, suggest that in addition to health, the economic ramifications of obesity are also a primary discussion point in OiBP. These verbs, specifically *rise*, *double* and *increase* also suggest that the rate at which obesity levels are rising is a third potential theme in OiBP. This is further evidenced by the adjective predicates of obesity which include *high*, *prevalent* and *common* and the noun, *epidemic* which appears in multiple grammatical categories and, in the context of obesity, is also a metaphorical construction. Overall, the results of the keyword list and the word sketch of the lexical item *obesity* indicate that obesity is conceptualised as a negative phenomenon in OiBP. The results also provide areas for further analysis as they provide an initial insight into possible themes and semantic macrostructures which could emerge from the analysis. These initial insights indicate that the primary themes and potential semantic macrostructures in OiBP centre around the health and economic effects of obesity, the prevalence of obesity and actions taken in response to obesity. To explore this further, the analysis has been divided into three chapters. This chapter will focus on the clear metaphorical constructions which can be found in the word sketch results displayed in Table 4.3. Specifically, war metaphors including lexical items such as *fight*, *tackle*, *combat*, *fight* and *timebomb* and the *obesity epidemic* metaphor. Chapter 5 will focus on reported speech as the keyword list demonstrates a clear pattern of journalists regularly quoting outside sources within their stories. Finally, chapter 6 will explore personal narratives from people with obesity within the articles. The *pronominal possessors of obesity* category in Table 4.3 demonstrates that determiners such as *my*, *his* and *her* modify *obesity*. This implies that specific individuals are discussed and the determiner *my* suggests that these individuals could be used as sources and contribute towards some of the stories. Therefore, these collocate pairs will be investigated further to compare the

representations of weight and obesity when the individuals at the core of the issue under discussion have some control over the narrative.

4.2 Metaphors in Broadsheets vs Tabloids

Metaphors are an expression of the human conceptual system (Lakoff and Johnson 1980: 6).

The essence of a metaphor involves talking, and potentially thinking about one issue in terms of another on the basis of some perceived similarity between them (Semino 2008: 5). They involve at least two concepts, the topic under discussion, referred to as the ‘target domain’ and the concept used to aid the description of topic, referred to as the ‘source domain’ (Semino 2008). Discussing two separate concepts together in this way invites comparison between the two and it establishes a link between them (see section 2.5 of the literature review for detailed discussion). The initial keyword and word sketch analyses detailed in the previous section suggests that obesity is generally portrayed negatively. The primary themes and semantic macrostructures beginning to emerge are that, (i) *obesity is detrimental to health and the economy*, (ii) *obesity is rising rapidly* and (iii) *action and intervention is required*. There are many linguistic features and collocate pairs which indicate this, as discussed in the previous section. Two of these include the metaphorical constructions, which conceptualise obesity as an epidemic and obesity as a war, signified by collocate pairs such as *obesity + epidemic*, *obesity + fight* and *obesity + tackle*. The remainder of this chapter will focus on these linguistic patterns.

The first stage of the analysis is focused on the frequency with which each of these two metaphors occur in OiBP as a whole and broadsheet and tabloid newspapers respectively.

The *obesity epidemic* metaphor is a prevalent language pattern throughout the newspapers.

The lexical item *epidemic* is used to describe and refer to the prevalence of obesity in 99.9% of the instances in which it is used in OiBP (see section 4.3). It occurs a total of 1,942 times in broadsheet newspapers and 1,729 in tabloid newspapers (Table 4.4).

Table 4.4: *Epidemic* Relative Frequencies

<i>Epidemic</i> Relative Frequencies			
	Total Word Frequency	<i>Epidemic</i> Frequency	Frequency per 10,000 words
OiBP	9,750,139	3,671	3.8
Broadsheet	5,441,709	1,942	3.6
Tabloid	4,308,430	1,729	4

As demonstrated in Table 4.4, the total *epidemic* word count in each sub-corpus alone is misleading, as these figures would suggest that the lexical item *epidemic* is used to a greater degree in broadsheet newspapers. However, as Table 4.4 demonstrates, the relative frequencies calculated for both sub-corpora reveal that the lexical item *epidemic* is utilised slightly more in tabloid newspapers. The difference between the two figures is 0.4 per 10,000 words. This is a small difference and therefore, the conclusion can be made that the *obesity is an epidemic* metaphorical construction is used to a similar degree in broadsheet and tabloid newspapers.

The same analysis was carried out for the war-themed metaphorical constructions indicated by the word sketch analysis in the previous section. The war-themed metaphorical constructions differ to the epidemic metaphorical construction because there are many different lexical and collocational variations. For example, the verbs *fight*, *combat* and *tackle* and the noun *timebomb*, which are all collocates of obesity are considered war-themed metaphors in this investigation. The specific metaphors analysed in this chapter were identified through a collocation analysis of the lexical item *obesity* (see section 4.4). To investigate if there is a difference in the frequency with which broadsheet and tabloid newspapers utilise these metaphors, the relative frequencies of the nine specific collocate pairs analysed have also been calculated and the results can be found in Table 4.5.

Table 4.5: Relative Frequency of Individual War Metaphors in Broadsheet and Tabloid Newspapers

War Metaphor	Broadsheet Frequency	Frequency Per 10,000 Words	Tabloid Frequency	Frequency Per 10,000 Words
<i>Obesity + Tackle</i>	1,181	2.2	946	2.2
<i>Obesity + Fight</i>	454	0.8	397	0.9
<i>Obesity + Tackling</i>	507	0.9	330	0.8
<i>Obesity + Combat</i>	325	0.6	229	0.5
<i>Obesity + Battle</i>	159	0.3	200	0.5
<i>Obesity + War</i>	113	0.2	149	0.3
<i>Obesity + Beat</i>	81	0.1	158	0.4
<i>Obesity + Timebomb</i>	43	0.1	124	0.3
<i>Obesity + Fighting</i>	77	0.1	76	0.2

The results in Table 4.5 largely echo those in Table 4.4, revealing only a small difference in the relative frequencies of the individual war-themed metaphorical constructions under analysis. For example, the *obesity + tackle* collocate pair has a relative frequency of 2.2 per 10,000 words in both broadsheet and tabloid newspapers. The largest variation between relative frequencies is the *obesity + beat* collocate pair which has a difference of 0.3 per 10,000 words in favour of tabloid newspapers. Therefore, the differences are small and it is clear that broadsheet and tabloid newspapers both use war-themed metaphors to a similar degree. Overall, the evidence in this section demonstrates that in terms of the prevalent metaphors utilised in OiBP, broadsheet and tabloid newspapers behave in a similar fashion.

4.3 Obesity is an Epidemic

4.3.1 Is Obesity an Epidemic?

In addition to within OiBP, the phrase, *the obesity epidemic* is used to a great extent throughout all aspects of society such as politics, health care, journalism, television, radio, social media and face-to-face interactions. Influential individuals and organisations such as

scientists, doctors, politicians, teachers, health care professionals and journalists argue that ‘the obesity epidemic represents a looming global health catastrophe’ (Gard and Wright 2005: 6). This analysis will argue that the *obesity epidemic* metaphor is problematic, despite its pervasiveness within OiBP. However, even the notion that the *obesity epidemic* is a metaphor is contentious and open to debate. The two primary reasons for the divide in opinions are centred around the definitions of each lexical item, *obesity* and *epidemic*. The validity of the *obesity epidemic*’s metaphorical categorisation is predicated on whether obesity is a disease and whether obesity can or cannot be classified as an actual epidemic. It is widely accepted that *epidemics* refer to the wide spreading occurrence of an infectious disease, resulting in sudden, rapid and wide-spread death (Hermiston 2010: 361). Slack (1992: 3) understands epidemics as ‘being transmitted from person to person, and as arising from particular, usually filthy, local conditions.’ Sharing his stance is Gordis (2004: 18), arguing that epidemics are an occurrence of a disease ‘clearly in excess of normal expectancy and derived from a common or propagated source’. In accordance with both Slack and Gordis, in the 42nd edition of Black’s Medical Dictionary, Marcovitch (2005: 242) discusses the infectious and contagious nature of epidemics and states that epidemic diseases are ‘typically transmitted from person to person or from a contagion which has been exposed to a large number of people.’ While the traditional definitions of the term *epidemic* include reference to the fact that the disease in question is infectious, in more recent times, this aspect of epidemics has not been as distinguished or emphasised as it previously has. For example, the current World Health Organisation definition reads,

‘The occurrence in a community or region of cases of an illness, specific health-related behaviour, or other health-related events clearly in excess of normal expectancy. The community or region and the period in which the cases occur are specified precisely. The number of cases indicating the presence of an epidemic varies according to the agent size and type of population exposed, previous experience or lack of exposure to the disease, and time and place of occurrence.’

(World Health Organisation 2020b)

In addition, the Meriam Webster Dictionary defines *epidemic* as, ‘affecting or tending to affect a disproportionately large number of individuals within a population, community, or region at the same time. Typhoid was *epidemic*’ (Merriam Webster Online Dictionary 2017). Similarly, The Cambridge Dictionary states that an epidemic is ‘the appearance of a particular disease in a large number of people at the same time: *a flu epidemic*’ (Cambridge Dictionary 2017). Interestingly, despite the fact that neither of these dictionaries include reference to epidemics being infectious, the examples both dictionaries provide to demonstrate the word used in context, are infectious diseases. Despite the fact that the infectious and contagious aspect of epidemics is not explicitly mentioned in all definitions, it can be argued that because traditional definitions and definitions found in medical texts such as Marcovitch (2005) and Slack (1992) highlight the *infectious* nature of epidemics, that actual epidemics should be treated and considered as such.

Boero (2007) argues that the term *epidemic* has been used as a metaphor to emphasise the prevalence of phenomena so frequently that it has become natural and normal for non-infectious illnesses and medical conditions to be considered literal epidemics. She uses the term ‘post-modern epidemics’ to describe ‘the process in which unevenly medicalised phenomena lacking clear pathological basis get cast in the language and moral panic of traditional epidemics’ (Boero 2007: 41). Obesity is an issue, or in Boero’s terms, a post-

modern epidemic, that lacks clear pathological basis, it has none of the characteristics of a traditional epidemic, and its status as a disease is debateable (Grol-Prokopczyk 2010: 345). It is not abundantly clear what exactly causes obesity. Hill and Peters (1998: 1371) explain that obesity can only arise when energy intake exceeds energy expenditure. However, an energy imbalance is often the result of overeating and the exact reasoning behind overeating has not yet been determined. The energy imbalance theory carries scientific pedigree, but some scientists dispute it and argue that obesity poses serious health threats and should be classified as a chronic disease (Hill 1998: 34). Conversely, Marcovitch (2005: 504) describes obesity as a ‘nutritional disorder’. The debate regarding the veracity of obesity’s status as a disease is beyond the scope of this research. However, it can correlate with medical conditions such as cardio-vascular disease, type two diabetes, asthma and some forms of cancer (Sullivan 2010: 315). Therefore, it falls within the semantic field of *medicine*. This could lead to the belief that this fact alone means that the term *epidemic* can literally be applied to obesity. However, an analysis of the evidence cited in this section suggests that an infectious and contagious element is required for a medical condition to be labelled as a literal epidemic.

A final argument as to why obesity cannot be classed as a literal epidemic includes the rate at which obesity levels are rising. Referring back to Hermiston (2010: 361), an epidemic traditionally refers to a disease whose occurrence is rapid and wide spreading. Table 1.1 in chapter 1 demonstrates that within the last ten years, obesity numbers have risen by approximately 2%. In addition, this rise has not been a steady upward trajectory. Compared to a literal epidemic such as COVID-19 which infected 4.1 million people within six months of the first documented case (World Health Organisation 2020c), it can be argued that an inconsistent increase in obesity levels of 2% in ten years cannot be classified as *rapid*.

Furthermore, a true epidemic refers to the initial occurrence of a prevalent disease, the term is

used to describe an event as opposed to a trend (Rosenberg 1992: 279). Obesity is not a new phenomenon, yet the term *epidemic* has only become a salient aspect of obesity discourse in the last 15-20 years (Grol-Prokopczyk 2010: 345). *Epidemic* is typically used when the initial occurrence takes place, if it affects a large number of people quickly. For example, when AIDS broke out in the 1980s, thousands of cases were reported, and it caused thousands of deaths. Therefore, it was labelled an *epidemic*. In today's society, AIDS still exists, people are contracting the illness and it still causes deaths. However, it is very rarely referred to as an epidemic because using Rosenberg's (1992) terms, it is no longer an event, it is a trend. Taking all of these arguments and facts into consideration, it is clear that obesity cannot be classified as a literal epidemic and therefore, *the obesity epidemic* is treated as a metaphor in this research.

4.3.2 *Epidemic in Use*

The lexical item *epidemic* occurs 3,671 times within OiBP. It is the fortieth keyword (see Table 4.1), the twentieth most frequent collocate of *obesity* (see Appendix 11) and *the obesity epidemic* is the third most frequent word cluster in the data (n= 1,015) after *national obesity forum* (n= 1,560) and *the national obesity* (n=1,523). Therefore, this is undoubtedly an important aspect of the obesity media narrative. Referring back to section 3.1.1, a prerequisite set during the data collection process was that the words *obese* or *obesity* had to appear three or more times within an article for it to be included in OiBP. This was done to ensure that obesity is the primary topic or one of the primary topics under discussion. As *epidemic* is a key and frequent linguistic component of OiBP, to investigate its use in relation to weight and obesity further, all of the concordance lines with *epidemic* as the node word have been examined and analysed. This analysis reveals that the lexical item *epidemic* is used to emphasise the prevalence of obesity in 3,666 out of the 3,671 (99.9%) times it occurs. This is achieved through explicitly labelling obesity as an epidemic, inculcating obesity as the

catalyst for other epidemics and comparing the high rates of obesity to past epidemics (see Table 4.6 and extracts 2, 3 and 4). The five times in which *epidemic* does not explicitly or, through a comparison, refer to obesity, it is used to discuss the ‘sugar epidemic’ For an example, see extract 1.

Extract 1: The Guardian, 22nd October 2015

The food and drinks lobby has been reluctant to accept even the simplest solutions to the **sugar epidemic**, such as clear labelling

The remainder of the analysis will focus on the 3,666 concordance lines which discuss obesity and weight. Extract 2 is an example of how the *obesity epidemic* metaphor is used to directly refer to obesity and weight.

Extract 2: The Daily Express, 9th July 2012.

Obesity is the 21st century's first major **epidemic**

Obesity is not directly referred to as an *epidemic* in every instance (see Table 4.6). The prevalence of obesity is also highlighted in two other ways. One of which is by establishing obesity as the cause of other *epidemics* (see extract 3).

Extract 3: The Times, 21st May 2007

Obesity warning. Britons are risking an **epidemic** of **cancer** by failing to curb rising levels of **obesity**, according to an expert.

Finally, extract 4 demonstrates how the prevalence of obesity is also highlighted through comparisons to past epidemics.

Extract 4: The Guardian, 21st September 2014

The **obesity** problem in our country is where the **HIV epidemic** was 10 years ago. Details and figures regarding how the lexical item *epidemic* is used in OiBP can be found in Table 4.6 and further discussions of each can be found in sections 4.3.3 and 4.3.4.

Table 4.6: How *Epidemic* is Used in OiBP

<i>Epidemic</i> (n= 3,666)		
How it is Used	Lexical Item	Frequency
Direct Reference to Obesity/Weight		3452 (94.2%)
	obesity	3,384
	fat	43
	obese	25
Blaming Obesity for Epidemics of Other Conditions		189 (5.1%)
	diabetes	118
	cancer	13
	liver disease	12
	diet pills	11
	heart disease	9
	insomnia	7
	back pain	4
	asthma	4
	alzheimer's	3
	high blood pressure	2
	depression	2
	arthritis	2
	anaemia	1
	kidney disease	1
Comparison to Past Epidemics		25 (0.7%)
	HIV/AIDS	11
	influenza	10
	cholera	2
	whooping cough	1
	measles	1

4.3.3 Direct Reference to Obesity/Weight

As demonstrated in Table 4.6, 3,452 (94.2%) of the concordance lines for *epidemic* reveal that the lexical items *obesity* (n= 3,384), *fat* (n= 43) and *obese* (n= 25) are directly referenced and described as *epidemics*. See extracts 5-12 for examples of this.

Extract 5: Daily Mirror, 9th November 2008

Government campaign to combat the **obesity epidemic**.

Extract 6: The Daily Telegraph, 16th January 2015

The **obesity epidemic**, which is killing millions and costing billions when the cure is free

Extract 7: The Daily Mail, 12th September 2007

The NHS has failed to tackle the **obesity epidemic**

Extract 8: The Guardian, 3rd December 2010

Initiatives must be led by science if we are to bring the **obesity epidemic** under control

Extract 9: Daily Mirror, 15th October 2007

The shocking scale of the **obesity epidemic** threatens to reverse 200 years of extended life expectancy

Extract 10: The Independent, 4th January 2013

We have an **epidemic** of **obese** six-year-olds

Extract 11: Daily Mail, 3rd March 2012

Experts warned yesterday of an **epidemic** of **fat** mothers.

Extract 12: The Sun, 5th April 2008

Experts will monitor eating trends and develop new Government policies to fight the **fat epidemic**.

Within these metaphors, the subject under discussion, or the target domain, is *obesity*, specifically its prevalence within Britain. In order to aid the description of this issue and better articulate their position, the journalists have drawn on a separate concept, referred to as a source domain, which is *epidemic(s)*. As discussed in section 2.3 of the literature review, it is demonstrated that analysing which source domains have been selected to metaphorically represent the target domain can reveal any backgrounded ideologies towards the issue under discussion. The semantic connotations of epidemics include fear, threat, disaster, death,

sickness and infectious and contagious disease (Gard and Wright 2005: 8). By utilising a metaphor and describing one concept in terms of another, language users create a relationship and establish a link between the target domain and the source domain (Semino 2008: 6). Therefore, it can be argued that a link and a relationship is being created, reiterated and naturalised between *obesity* and *epidemics*. As discussed in section 4.3.1, obesity is not easily and arguably not accurately classifiable as an epidemic, making this link between the two concepts misleading and misrepresentative. In addition, as epidemics are a negative phenomenon, creating a relationship between them and obesity through this metaphor can lead to a negative representation of obesity throughout the discourse. In terms of Reisigl and Wodak's (2001) strategies of self- and other- representation introduced in section 3.3.3, clear reference and predication strategies have emerged in the analysis of the *obesity epidemic* metaphors. Reference strategies refer to how individuals and social groups are linguistically referred and in the case of discriminatory discourse this can include derogatory and stigmatising labels (Reisigl and Wodak 2001: 45). Through this metaphor, obesity, and arguably people with obesity are labelled and referred to as an *epidemic*. Extracts 10 and 11 in particular highlight this, stating that 'we have an epidemic of obese six-year-olds' and 'an epidemic of fat mothers'. In these examples, specific groups of individuals as opposed to obesity in general are explicitly labelled as an *epidemic*, providing evidence that through reference strategies, explicit negative representations of obesity and individuals with obesity are shaped. The semantic connotations of this specific label are alarmist, and it can be argued that labelling a group of people as an *epidemic* is dehumanising as epidemics traditionally refer to illnesses and viruses (Marcovitch 2005: 242). Therefore, ascribing this label to people with obesity can deprive the issue of humanity and compassion. Predication strategies assign qualities and characterise social actors (Reisigl and Wodak 2001: 54). If the target domain adopts the qualities and semantic connotations of the source domain through repeated use,

then obesity adopts qualities and semantic connotations which include imminent fear, danger and threat. It is clear from the extracts that these are the intended ideological underpinnings of the *obesity epidemic* metaphor as the surrounding co-text supports and reinforces them. Extract 6 for example, details how the *obesity epidemic* ‘is killing millions and costing billions’, further perpetuating and emphasising ideologies of threat and detriment, health-wise and economically speaking. In addition, extract 9 discusses the ‘shocking scale’ of the *obesity epidemic*. Using further alarmist and sensationalist language such as the adjective *shocking* provides evidence that the metaphor is intended to incite alarm and reinforces the negative representation generated by the *obesity epidemic* metaphor. This metaphor is pervasive within OiBP and by assigning these negative labels, qualities and associations to obesity, a negative representation emerges through the obesity media narrative. It can be argued that the dehumanising semantic connotations of *epidemic* foster a divide within society and an ‘us’ versus ‘them’ mentality towards the issue. Through this metaphor, obesity is positioned as a threat and a detriment to health and to the economy. Therefore, people with obesity, particularly circumstances in which they are explicitly referred to as an epidemic, are also positioned as a threat and a detriment, which can arguably contribute towards and create social polarisation. Therefore, through negative reference and predication strategies, specifically the use of the *obesity epidemic* metaphor, a negative representation of weight and obesity, wherein these issues and individuals associated with these issues are depicted as a pervasive threat, is perpetuated throughout OiBP. In section 2.5, Thibodeau and Boroditsky’s (2011) study into the effect of metaphors on public perceptions provided empirical evidence suggesting that the metaphors members of society are exposed to in news media can influence the way in which social groups and social actors are perceived by members of society (Thibodeau and Boroditsky 2011: 5). Corresponding results were also found in Hendricks et al. (2018). Therefore, it can be argued that the negative representation created

and reinforced by the *obesity epidemic* metaphor polarises people with obesity from the remainder of society and propagates harmful ideologies surrounding weight.

In addition to providing evidence that divisive and socially polarising representations are an aspect of the obesity media narrative, the analysis to this point also provides further evidence towards themes and potential semantic macrostructures in OiBP. The keyword list (Table 4.1) and the word sketch analysis of *obesity* (Table 4.3) feature lexical items such as *diabetes*, *cancer*, *heart disease*, *cost* and *NHS* and therefore, indicate towards health and the economy being a theme and semantic macrostructure in OiBP. The qualitative analysis surrounding the *obesity epidemic* metaphor and its use in OiBP further substantiates this notion. As the *obesity epidemic* metaphor is pervasive pattern in OiBP, it can be argued at this stage of analysis that a semantic macrostructure in OiBP centres around obesity's negative effect on health. In addition, statements, as detailed in extract 6, such as the 'obesity epidemic is killing millions and costing billions' and extract 7, 'the NHS has failed to tackle the obesity epidemic' add further evidence for this argument and imply that the economy is also under threat from obesity. In addition, due to the definition of *epidemic*, when paired with *obesity*, it perpetuates the ideology that obesity levels are rising rapidly. This, combined with the fact that lexical items such as *increase*, *rise*, *double* and *percent* feature on the keyword list (Table 4.1) and the word sketch analysis of obesity (Table 4.3), indicates that an additional key message and potential semantic macrostructure in OiBP focuses on the prevalence of obesity.

Through this metaphor alone, these two semantic macrostructures begin to emerge, and both are misrepresentations of the issue of weight and obesity. Sections 5.4.1 and 5.4.2 later in the analysis provide a full discussion as to why the message that *obesity is detrimental to health and the economy* is misrepresentative. Expanding on the message that *obesity is rising rapidly*, an additional strategy of self- and other- representation proposed by Reisigl and

Wodak (2001) is intensification and mitigation. This strategy refers to the sharpening and toning down of certain aspects of an issue in order to generate a particular identity for social actors and groups (Reisigl and Wodak 2001: 45). The *obesity epidemic* metaphor enforces the belief that *obesity is rising rapidly*. This metaphor is utilised at a consistent rate throughout all of the years in which this corpus covers. For this analysis, OiBP was divided into 11 sub-corpora for each year the data covers. The raw and relative frequency with which the lexical item *epidemic* is used in each sub-corpus has been calculated. As discussed at the beginning of this section, the lexical item *epidemic* is used to metaphorically conceptualise the issue of obesity 99.9% of the times it is used. Therefore, Table 4.7 displays the frequency with which a version of the *obesity epidemic* metaphor, for example *fat epidemic* and *epidemic of obese people*, is used in each year OiBP covers.

Table 4.7: Diachronic Analysis of *Obesity Epidemic* Use Throughout OiBP

<i>Obesity Epidemic</i> Metaphor Relative Frequencies			
Year	Overall Word Frequency in Each Sub-Corpus	<i>Epidemic</i> Frequency	Frequency per 10,000 words
2006	824,043	304	3.7
2007	904,116	370	4.1
2008	784,136	347	4.4
2009	705,226	284	4
2010	826,476	262	3.1
2011	750,266	243	3.2
2012	891,861	337	3.8
2013	948,439	326	3.4
2014	1,018,909	437	4.2
2015	1,189,013	451	3.8
2016	907,669	310	3.4

Referring back to Table 1.1, which details the figures of obesity levels in the United Kingdom, from 2006-2016 there has been an overall increase of approximately 2%. This increase has not been consistent, 2009 for an example saw a 3% decrease in national obesity

levels in men and 2007 saw a decrease of 1% in both men and women. Interestingly, as revealed by Table 4.7, both 2007 and 2009 are among the years in which the *obesity epidemic* metaphor is used at some of the highest rates in British newspapers. Through this metaphor, the message that *obesity is rising rapidly* is intensified and the true plateau in national obesity levels is suppressed from the obesity media narrative. An argument can be made that despite obesity levels between 2006-2016 being relatively consistent, they are still high, and therefore the use of the metaphor, *obesity epidemic* is appropriate and does not perpetuate a false and misrepresentative narrative. However as highlighted, the discussions surrounding the definition of *epidemic* in section 4.3.1, epidemics traditionally refer to a disease whose occurrence is rapid and wide spreading (Hermiston 2010: 361). In addition, the term is used to describe an event in which a disease breaks out, as opposed to a prevalent trend of a phenomenon whose status as a disease is debateable (Rosenberg 1992: 279). Therefore, to use the concept of epidemics as a metaphor to describe and refer to the prevalence of obesity misinforms the audience. Directly conceptualising obesity as an epidemic is sensationalist, hyperbolic and leads to an inaccurate portrayal of the issue. As discussed in the section 3.3.1 the collocates of a node can contribute towards its meaning and its implications (Baker, Hardie and McEnery 2006: 38). In addition, when a lexical item within a strong and frequent collocate pair occurs in isolation, the concept and semantic connotations of the other lexical item could still be subconsciously applied (Baker, Hardie and McEnery 2006: 38). This notion is referred to as semantic prosody (Louw 1993: 158) and means that through excessive use of the *obesity epidemic* metaphor, the concept of obesity can adopt the negative semantic connotations of *epidemic* even when the lexical item *obesity* is used in isolation. These semantic connotations create misinformation, dehumanisation, sensationalism and are hyperbolic. The result of this is a false, negative and polarising semantic prosody for obesity,

the sociological consequences of which can include stigmatising and divisive attitudes targeted towards people with obesity.

4.3.4 Blaming Obesity for Epidemics of Other Conditions and Comparisons to Previous Epidemics

When obesity is not directly referred to as an epidemic, it is often discussed in terms of its relationship with associated medical conditions (see Table 4.6) such as diabetes and heart disease (n= 189) and is compared to past literal epidemics such as HIV/AIDS (n= 25). See extracts 12-18 for examples of this.

Extract 12: The Times, 22nd March 2016

Four million people in Britain have diabetes and the number is rising thanks to an **epidemic** of **type 2 diabetes** which is driven by **obesity**.

Extract 13: The Daily Mail, 26th January 2012

Health experts fear that Britain faces an **epidemic** of **type 2 diabetes** as a result of the rise in **obesity** in recent years.

Extract 14: The Daily Express, 3rd October 2016

Britain's **diabetes epidemic** could bankrupt the NHS within years experts have warned. At the heart of the crisis is lifestyle driven Type 2, a preventable but deadly condition **caused by our obsession with sugary snacks**

Extract 15: The Guardian, 12th August 2013

One in three under-16s in the UK is **overweight** or **obese** - a ticking time-bomb for a future **epidemic** of **heart disease**

Extract 16: Daily Mail, 9th December 2016

Tom Frieden, of the Centres for Disease Control and Prevention, said
‘America was finally seeing the ramifications of the increase in **obesity**’. The
last time life expectancy fell in the US was due to the **AIDS epidemic** in the
1990s.

Extract 17: The Sun, 1st December 2015

Ministers have been warned that 70,000 early deaths a year caused by **poor**
diets are just as serious as a **flu epidemic**.

Extract 18: The Daily Express, 14th April 2010

Dr Ryan added: "I think we have never been here before. We have never faced
this **epidemic [obesity]**. It didn't happen in history. There were **cholera**
epidemics, measles epidemics, whooping cough epidemics. This is subtle. It
is in the background. But it's massive."

As demonstrated in Table 4.6, blaming obesity for supplementary *epidemics* and comparing the prevalence of it to past literal epidemics is not as common as the direct references discussed in section 4.3.3. Starting with the references to associated medical conditions (extracts 12-15), although obesity is not directly referred to as an *epidemic*, it is portrayed as the culpable factor for the medical conditions which are being metaphorically conceptualised as an *epidemic*. The ideology that obesity causes diseases such as cancer, diabetes and heart disease is misrepresentative (discussed fully in sections 5.4.1 and 5.4.2). This builds on the negative predication discussed in section 4.3.3, where it was argued that when obesity is directly metaphorically conceptualised as an *epidemic*, it creates a negative and polarising representation for obesity and people with obesity. When obesity is positioned as a catalyst for additional *epidemics*, the negative semantic connotations and implications are amplified. Obesity becomes a culpable factor to these supplementary diseases in addition to being

depicted as a fearful and threatening phenomenon on its own. Extracts 12 and 13 for example attribute the ‘epidemic of type 2 diabetes’ as being ‘driven by’ and ‘a result of’ obesity.

Extract 15 describes obesity as a ‘ticking time-bomb for a future epidemic of heart disease’.

In addition to attributing fear, danger and threat as qualities of obesity, these specific *epidemic* metaphors attribute the quality, *driver for disease*, adding to the negative predication strategies uncovered previously and adding to the divisive and polarising representation of obesity and people with obesity.

In addition to broadening the strategies of predication, these *epidemic* metaphors also provide further evidence for the proposed semantic macrostructures in OiBP. Specifically, the semantic macrostructure, *obesity is detrimental to health and the economy*. When obesity is directly referenced as an *epidemic*, the implication that obesity is harmful to health results from the semantic connotations of *epidemic*. In these examples, obesity is overtly positioned as a detriment to health by causing other metaphorical epidemics such as heart disease and type 2 diabetes, thereby explicitly enforcing the notion that obesity is detrimental to health. The implicit implication of the *obesity epidemic* metaphor, it can be argued, is that because obesity is detrimental to health, it is also detrimental to the British economy. The National Health Service in Britain is a valued public and tax-funded system, any threat to which is publicly received as negative. An epidemic threatens this system, an epidemic caused by obesity threatens this system and an epidemic of people with obesity threatens this system. In extract 14, there is also an explicit link made between obesity and the economy. In this extract stereotypical behaviours associated with obesity are attributed as causes for Type 2 diabetes, which is positioned as bankrupting the NHS. In addition, later in the article obesity is described as ‘an aggravating factor for Type 2 diabetes’. Therefore, this provides further evidence that the economic in addition to the health impact of obesity are central aspects of the obesity media narrative.

The quality of threat attributed to obesity through this metaphorical construction has a negative and multi-faceted sociological impact. The threat of obesity can lead to a fear of fatness which can lead to harmful ideologies surrounding weight in general. In addition, when coupled with the fact that there is a large element of personal blame, specifically laziness, lack of motivation and poor self-control associated with obesity (Grol-Prokopczyk 2010: 360), the threat obesity is portrayed to have on health and the economy can lead to negative and polarising social ideologies about people with obesity. This is because in addition to the pervasive societal tropes which equate fatness to laziness and gluttony, the *obesity epidemic* metaphor and the way it is utilised in this corpus, positions fat people, people with obesity, as a threat to other individuals and their valued national health system. These ideologies are inaccurate (see section 2.1), they further divide social groups within society and further perpetuate an us vs them mentality towards obesity and people with obesity. Obesity is a human issue, and medicalising obesity through this linguistic representation ‘presents fatness as a disease epidemic and strips away humanity, focusing solely on a medical condition and silencing but stigmatising the people involved’ (Herndon 2002: 125).

Further perpetuating these ideologies is the final way in which *epidemic* conceptualises the issue of obesity, which is the comparison of obesity and behaviours societally associated with obesity such as ‘poor diets’ to past literal epidemics (n= 25). In these examples, the concept of *epidemics* is not being utilised metaphorically as it is referring to literal epidemics from previous years (see extracts 16-18). However, the effects of this comparison mirror those discussed previously. The prevalence of obesity and the rate at which it is increasing is embellished, the semantic connotations of this comparison include fear and threat and the representation of obesity and people with obesity is divisive and negative. By tarnishing the perception of obesity, by extension, it damages the perception of people with obesity.

Previous epidemics such as AIDS and Ebola are caused by microbes such as bacteria and viruses. In these instances, it is the spread of the virus or the bacteria which is being described as an epidemic. Even in instances such as these, it is argued that the rhetoric surrounding these diseases is dehumanising (Sontag 1989: 11). Regarding obesity, there is no tangible cause, there is no virus or bacteria which has been scientifically proven to cause obesity and it is argued that the cause of obesity is primarily behavioural (Grol-Prokopczyk 2010: 360). Therefore, in this regard, it is difficult to separate obesity from the individual. To describe obesity as an *epidemic*, is to describe people with obesity as an *epidemic* which, as argued, perpetuates stigmatising, dehumanising ideologies and creates social divides. As this research does not include audience reception work, this argument could be deemed as somewhat arbitrary. However, referring back to section 2.4 of the literature review, Couch et al.'s (2015) research engaged with individuals with obesity and their participants felt ashamed, othered and stigmatised by the news media representation of obesity (Couch et al. 2015: 6). Therefore, taking this into account in addition to the dehumanising semantic connotations of *epidemic*, it can be argued that the *obesity epidemic* metaphor is could have socially divisive effects.

4.3.5 Sociological Impact of the 'Obesity Epidemic'

Obesity and weight are social issues, with the rising societal emphasis on thinness which began in the 1960s, being paralleled with a rising societal rejection of fatness (Sobal 1999: 233-34). A social rejection of fatness leads to a fear of fat, whereby people with obesity and the idea of having obesity becomes abhorrent to some (Puhl and Brownell 2001: 800). Expanding on this, there are predominant societal stereotypes about obesity and individuals with obesity which include laziness, lack of will power, a lack of moral character, poor personal hygiene, low level of intelligence and unattractiveness (Puhl and Brownell 2001: 800). These negative ideologies and fear of fat are supported by and exacerbated by the

obesity epidemic metaphor. As discussed in sections 4.3.3 and 4.3.4, the semantic connotations of the *obesity epidemic* metaphor reinforce fear, dehumanisation and generate ideologies of chaos and threat in relation to the prevalence of obesity and its potential health outcomes.

Strategies of social representation including predication, whereby positive or negative qualities are attributed to social groups and intensification and mitigation, whereby certain aspects of social groups are emphasised or de-emphasised to fulfil ideologically oriented goals (Reisigl and Wodak 2001: 45), have been discussed in sections 4.3.3 and 4.3.4. van Dijk (1998: 267) argues that the specific linguistic strategies used to represent social actors and social groups in discourse subsidise four main moves which he describes as an ‘ideological square’ (van Dijk 1998: 267). The linguistic strategies of representation found in the analysis of the *obesity epidemic* metaphor, it has been argued, endorse divisive, us vs them social ideologies. Utilising van Dijk’s model, the move in which the *obesity epidemic* resides is *emphasising their negative characteristics*. van Dijk’s model was designed for the representation of social actors and social groups but can additionally be applied to social issues. It is through the *emphasis of negative characteristics* that the issue of obesity and people with obesity are separated from the remainder of society and positioned as a threat. Beginning with obesity in general, a characteristic perceived to be negative is its rising rates. In section 4.3.3 it is detailed how the rates are not rising as sharply as indicated by the media. However, this false narrative is pervasive throughout OiBP and the *obesity epidemic* metaphor is utilised to enforce it. Metaphors are used to express how we conceive issues (Lakoff and Johnson 1980: 6). The concept of *epidemics* is a negative characteristic attributed to obesity in these metaphors, a negative characteristic which is emphasised each time it is used. The frequency with which this metaphor occurs is high and therefore, this particular negative characteristic is frequently emphasised in OiBP. In addition to highlighting the

prevalence of obesity, the *obesity epidemic* metaphor medicalises obesity and therefore, illness and its consequences are another negative characteristic highlighted by this metaphor. Obesity is portrayed as a catalyst for disease and death and people with obesity are portrayed as threatening their physical health and the fiscal health of the NHS. This further enhances the ideologies of detriment and threat and polarises people with obesity.

An interesting aspect about the negative characteristics emphasised through this metaphor is that they are either exaggerated or inaccurate. Obesity levels, whilst high are not increasing at a rapid rate (see section 4.3.3) and the medical and financial impact of obesity is complex and misrepresented (see section 5.4.1 and 5.4.2 for a full, in-depth discussion). Therefore, false and unrepresentative negative characteristics are being repeatedly associated with obesity and people with obesity through the *obesity epidemic* metaphor and multiple linguistic strategies of representation. The effect of this is the perpetuation of stigmatising ideologies which isolate and stigmatise people with obesity. The polarisation of people with obesity in the media is an example of weight bias and bias ideologies can lead to stigmatising acts. Section 2.1 discusses some of the research into the effect of weight bias and stigma on members of society who have experienced it, detailing that it can have a severe effect on an individual's mental health by tarnishing their self-esteem, making them feel ostracised from the rest of society, inducing feelings of shame, guilt, depression and can even lead to suicidal thoughts and ideations (Ogden and Clementi 2010: 1-6). In addition to mental health, physical health can be affected and efforts to lose weight and gain societal acceptance can lead to an unhealthy and tumultuous relationship with food (Ogden and Clementi 2010: 5). The temptation to sensationalise issues and stories is desirable to journalists as there are tight deadlines accompanied with pressures to create entertaining stories to encourage sales (Leask, Hooker and King 2010: 2). However, while effective in terms of newspaper sales, the

sociological effects of this is wide misinformation rooted in weight bias can be devastating for the many who are affected.

4.3.6 'Obesity Epidemic' Conclusions

The results of this analysis have thus far exhibited that the language utilised in the British obesity news media narrative is laden with stigmatising implications. Such examples include the *obesity epidemic* metaphor, through which the prevalence of obesity is sensationalised. The levels of obesity in Britain can be articulated in numerous different ways such as *the rising prevalence of obesity* or *the increase in obesity*. As demonstrated by the figures in Table 4.3, the *obesity epidemic* is favoured over more ideologically neutral language choices such as these. The *obesity epidemic* metaphor is prevalent throughout OiBP, variations of which such as *fat epidemic*, *obesity epidemic* and *epidemic of obese people* appearing 3,666 times in total. This metaphor is utilised to highlight the rising prevalence of individuals with obesity in Britain and the potential health and economic implications of this. There are predominantly three different ways in which these messages are enforced through the metaphor. These included directly referring to the issue of obesity as an *epidemic* (n=3,452), referring to the medical conditions associated with obesity as *epidemics* (n= 189) and comparing obesity to previous literal epidemics (n=25). Through the linguistic strategies of reference, predication and intensification and mitigation, exaggerated and inaccurate negative characteristics are emphasised by the *obesity epidemic* metaphors found in this corpus. It is argued that this generates a negative representation for weight, obesity and people with obesity by reinforcing semantic macrostructures which are, *obesity is rising rapidly*, and *obesity is detrimental to health and the economy*. In addition, it is argued that due to the semantic connotations of *epidemic*, obesity and people with obesity are characterised as a threat which generates a fear of fat and divisive, polarising social ideologies. The effects of

these ideologies are harmful for those they target, detrimentally affecting their physical and mental health for the purposes of sensationalism and newspaper sales.

4.4 War-Themed Metaphors

The war-themed metaphorical constructions which will be analysed in this chapter were initially highlighted by the word sketch analysis of the lexical item *obesity*, as it revealed verbs such as *tackle*, *combat* and *fight* are frequent collocates of *obesity* (see Table 4.3).

While the word sketch tool looks at collocational patterns, it differs from a standard collocation analysis as it establishes grammar patterns relating to the node word (Kilgarrieff et al. 2004: 107). In terms of the collocation span,

‘rather than looking at an arbitrary window of text around the headword, we look, in turn, for each grammatical relation that the word participates in [...] The word sketch then provides one list of collocates for each grammatical relation the word participates in.’

(Kilgarrieff et al. 2004: 107).

The word sketch analysis provided a window into the prevalent themes and messages within OiBP. To build on the war theme which emerged from the word sketch analysis and to gather more war-themed metaphorical constructions for the analysis, a standard collocation analysis of the lexical item *obesity* (L5, R5), with frequency as the collocation measure was carried out. Table 4.8 demonstrates the lexical items with war-themed semantic connotations appearing in the top 500 collocates of *obesity*.

Table 4.8: War-Themed *Obesity* Collocates

<i>Obesity</i> (n= 49,343)	
War-Themed Collocate	Frequency
tackle	2,127
fight	851
tackling	837
combat	554
battle	359
war	262
beat	239
timebomb	167
fighting	153
Total	5,549 (11.2%)

The results in Table 4.8 demonstrate that at a minimum rate of 5,549, which equates to 11.2% of the instances in which the lexical item *obesity* occurs, it collocates with a war-themed lexical item. This is considered a ‘minimum’ because *obesity* has 7,714 different collocates in OiBP and as stated above, the results in Table 4.8 appear within the top 500 collocates. As the analysis and discussion ensues it is evident that the nine lexical items in Table 4.8 are not the only war-themed metaphorical constructions utilised in OiBP, for an example see extract 19 which includes the lexical item *weapon*.

Extract 19: The Daily Star, 12th August 2007

Scientists have unveiled a new **weapon** to **fight** childhood **obesity**

Although there is evidence that more war-themed metaphors are present in OiBP, the qualitative analysis which follows will only focus on the nine metaphorical constructions in Table 4.8 as they are the most frequently occurring. When comparing the war-themed metaphors to the *obesity epidemic* metaphor, specifically the way in which they are used and the semantic and sociological effect they have, there are some similarities and there are some

differences. The analysis of these metaphors is divided into two primary sections, nouns and verbs. The lexical items *fight* and *battle* are used as both nouns and verbs in these metaphors, therefore they are discussed in both sections. The reason the analysis has been divided in this manner is because the ways in which the metaphors perpetuate divisive and stigmatising ideologies differs depending on whether the war-themed component of the metaphor is a noun or a verb.

4.4.1 Noun Variations of the War-Themed Metaphors

The specific lexical components of the war-themed metaphors analysed in this section are *timebomb*, *war*, *fight* and *battle*. These lexical items, like *epidemic* are nouns and there are similarities with the way in which they are used and the implications they have, particularly with the *timebomb* metaphors. The first similarity between the *timebomb* and *epidemic* metaphors is their semantic connotations which contribute towards the same emerging semantic macrostructures. *Timebomb*, like *epidemic*, carries implications of imminent threat and further endorses the proposed *obesity is rising rapidly* semantic macrostructure and the *obesity is detrimental to health and the economy* semantic macrostructure. Part of the foundation of the semantic macrostructure, *obesity is rising rapidly* is centred around the concept of time, which is a semantic connotation of *timebomb*. In addition, *timebomb* also carries semantic connotations of fear and imminent threat, which, when used in reference to issues such as health and the economy (discussed later in this section), further fortifies a semantic macrostructure which centres around the detriment of health and the economy. In addition to contributing to the same emerging semantic macrostructures, the sociological implications of this metaphor are similar to those of the *obesity epidemic* metaphor. In the discussions surrounding the *obesity epidemic metaphor*, it is argued that it enforces polarising ideologies which can create social divides rooted in an us vs them mentality. The war-themed semantic connotations of *timebomb* reproduces and reinforces this social divide. This is due

to the violent and dehumanising nature of the metaphor and its connection to the concept of war, an event in which there are two opposing sides. The concordance analysis of the *obesity* + *timebomb* collocate pair, represented in extracts 20-24, demonstrates how obesity is represented as an impending threat.

Extract 20: Daily Mail, 8th March 2006

Experts have warned of an **obesity timebomb** that is threatening the health of the nation and will cost the NHS billions in coming years

Extract 21: The Sun, 9th September 2008

Most parents also over-estimate how much exercise their children do, putting their health at risk and creating an **obesity timebomb**

Extract 22: The Times, 11th November 2011

Obesity is a ticking **timebomb** that is in danger of exploding

Extract 23: The Daily Telegraph, 24th September 2013

Obesity is the biggest **timebomb** for the health of our population

Extract 24: The Guardian, 22nd March 2007

The Treasury loses about £8.2 billion a year because of Britain's **obesity timebomb**

Similar to the *obesity epidemic*, Reisigl and Wodak's (2001: 45) reference and predication strategies can be found in the use of the *obesity timebomb* metaphor. Reference specifically refers to how individuals and social groups are linguistically referred to (Reisigl and Wodak 2001: 45). In this corpus obesity is overtly referred to as a *timebomb*, a reference which is extreme, alarmist and negatively represents the issue of obesity. This reference also overlaps with predication strategies as the semantic connotations and implications include danger and imminent threat, which then, it can be argued, become associated with obesity and people with obesity. In addition, parallel to the *obesity epidemic* metaphor, it can be argued that

referring to obesity and people with obesity as a *timebomb* can be dehumanising and further perpetuates biased ideologies towards weight. It is clear from the extracts that these notions are reinforced by the language which surrounds the collocate pair. Extract 20 for example describes the ‘obesity timebomb’ as ‘threatening the health of the nation’. In addition, in extract 22, the verb ‘ticking’ reinforces the notion of time and imminence, and lexical items ‘danger’ and ‘exploding’ reinforce the ideology that obesity is a threat. Furthermore, as the extracts demonstrate, the topics in which this metaphor are used in reference to are health and the economy. Therefore, it can be argued the same negative characteristics highlighted in section 4.3.5, obesity is a catalyst for disease and people with obesity are harming the fiscal health of the NHS, are emphasised with the *obesity timebomb* metaphor as well as the *obesity epidemic* metaphor. As argued in section 4.3.5, the emphasis of these misrepresentative characteristics in addition to the negative semantic connotations produced by these metaphors create a dehumanising social divide.

The use of the lexical item *war* in reference to obesity reinforces and arguably solidifies the socially divisive ideologies discussed so far. This is because the concept of war involves two sides battling against each other. Therefore, it can be argued that using it as a source domain in obesity related metaphors further perpetuates the us vs them ideologies introduced previously. Extracts 25-30 are examples of the *obesity + war* metaphors found in OiBP.

Extract 25: The Independent, 27th August 2008

The **war** on **obesity** is like the war on terror

Extract 26: The Times, 9th June 2010

Burnley GP surgery has joined the frontline in the **war** against **obesity**

Extract 27: The Daily Telegraph, 28th March 2013

Bacteria could become a powerful weapon in the **war** on **obesity**

Extract 28: Daily Express, 20th June 2012

We must wage an all-out **war** to defeat the **obesity** epidemic

Extract 29: Daily Mirror, 14th October 2013

We can lead this **war** on the **obesity** tsunami in the same way we led the way
on the smoking ban

Extract 30: The Sun, 17th December 2015

England spends millions of pounds in a new **war** on childhood **obesity**

These extracts display how divisive ideologies are perpetuated through the *obesity + war* metaphors. In addition to inciting the notion of sides and opposition through the concept of wars alone, these notions are reinforced by the metaphor's co-text. For example, comparisons to other wars in extract 25 and the choice to utilise lexical items which are semantically related to the concept of wars such as *frontline* in extract 26, *weapon* in extract 27 and *defeat* in extract 28. Perhaps the most interesting but subtle way in which the socially divisive ideologies are reinforced is through the prepositions which postmodify *war*. *War on obesity* and *war against obesity* are prevalent constructions of the *obesity + war* metaphor. Table 4.9 displays the exact frequencies in which all of the *obesity + war* metaphors under analysis occur in OiBP and the specific *war on obesity* and *war against obesity* constructions respectively.

Table 4.9: Preposition Variations of the *Obesity + War* Metaphors

All <i>obesity + war</i> Metaphors (n= 262)	
war <i>on</i> obesity	190 (72.5%)
war <i>against</i> obesity	44 (16.8%)
Total	234 (89.3%)

The extent to which prepositions affect the semantic influence of an utterance is a debated issue. Some argue that prepositions serve an arbitrary grammatical role and lack semantic

content (Hopper 1991: 22; Heine 1993: 55). However, in contrast it is also argued that prepositions are meaningful units that have come to be paired with related abstract concepts (Kranjec et al. 2010: 111). ‘Prepositions retain semantic content and provide a window into the semantics relating two lexical items, rather than merely highlighting a grammatical rule linking them together’ (Kranjec et al. 2010: 111 and 116). Analysing the *obesity + war* metaphors in use can provide evidence for the latter argument. The preposition *against*, even in isolation connotes opposition, therefore when paired with *war* and *obesity*, it can be argued that the divisive ideologies introduced by *war* are immediately reinforced by *against*. This is because *against* explicitly positions *obesity* as the opposition in this metaphorical war, thereby further reinforcing an us vs them association with obesity and people with obesity. The *war on obesity* metaphor is the most prevalent *obesity + war* collocate pair construction, as detailed by Table 4.9. Prepositions express a relationship between two parts of a sentence (Crystal 2004: 188). Therefore, the preposition *on* in the metaphor *war on obesity* is establishing the relationship between *war* and *obesity*. *War on* is an established formulaic sequence and the lexical item post-modifying it typically represents the entity or issue being fought against. Examples of some of the most frequent R1 collocates of *war on* from the BNC include *drugs*, *poverty*, *violence* and *crime*. All of these phenomena are negative, indicating that metaphoric wars are not declared onto positively deemed phenomena. In these contexts, it can be argued that the notion of opposition and division is introduced by the lexical item *war* and the preposition *on* specifies and introduces what or who the war is fighting against, thereby aiding and further perpetuating the division and opposition. *The obesity war* for example, is still a divisive construction because of the lexical item *war*, but it can be argued that the *war on obesity* is more specific and the positioning of obesity, syntactically and semantically as the opposing side in the metaphorical war, adds to the divisiveness of the metaphor.

The co-occurrence of prepositions with war-themed metaphorical constructions is not exclusive to the *obesity + war* collocate pair. When the lexical items *fight* and *battle* are utilised as nouns in these metaphors, they frequently co-occur with the preposition *against*. Table 4.10 displays the exact frequencies and extracts 31-34 are examples of the *fight against obesity* and the *battle against obesity* metaphorical constructions in use.

Table 4.10: Frequency of *Fight* and *Battle* as Nouns and Frequency of their Co-Occurrence with *Against*

Fight + Obesity (n= 851)		Battle + Obesity (n= 359)	
fight as a noun	n= 286/851 (33.6%)	battle as a noun	n= 310/359 (86.4%)
fight <i>against</i> obesity	n= 256/286 (85.9%)	battle <i>against</i> obesity	n= 157/310 (50.6%)

Extract 31: The Guardian, 22nd July 2008

Young pioneers in the frontline of NHS **battle against obesity**

Extract 32: The Daily Express, 9th June 2012

The discovery [‘fat-busting wonder pill’] could lead to a new weapon in the **battle against** spiralling **obesity**

Extract 33: The Daily Telegraph, 12th July 2014

Education is the key in the **fight against obesity**

Extract 34: The Daily Star, 3rd August 2012

The research is the latest step in the UK’s increasingly costly **fight against obesity**

The effects of these specific constructions, it can be argued, are the same as those of the *war against obesity*. *Battle* and *fight*, like *war*, connote hostility, winning versus losing, division and opposition. These connotations are reinforced by the semantic connotations and implications of the preposition *against*. As detailed by Table 4.10, the extent to which these constructions are used compared with the *war against obesity* is greater. For example, 256

(85.9%) of the instances in which *fight* is used as a noun in the *obesity + fight* metaphors, it is postmodified by *against*. This co-occurrence pattern is less frequent but still prevalent with *battle + obesity*, with 157 (50.6%) of the instances in which *battle* is utilised as a noun, it is postmodified by *against*. These examples and figures provide further evidence that divisive, us vs them ideologies towards obesity, people with obesity and the remainder of society are perpetuated by the language within the British obesity newspaper narrative. Within this narrative obesity is positioned as the enemy to ‘young pioneers’ and ‘the NHS’ in extract 31 and ‘the UK’ in extract 34. An in-depth discussion of the social actors and groups obesity and people with obesity are positioned against is provided in section 4.2.2. However, in terms of the specific examples in extracts 31 and 34, by using positive referential strategies to describe those *battling against* obesity in the example of ‘young pioneers’ in addition to positioning a valued system such as the NHS and the entire country in extract 34 against obesity, obesity and people with obesity are depicted as villainous opponents. This is because ‘young pioneers’, the NHS and the country are socially valued and viewed positively, therefore when extreme and divisive language such as *fight*, *battle* and *against* are utilised, it can be argued the individuals or issues positioned on the opposing side are automatically received negatively. As with *war on*, the most frequent post-modifiers of *fight against* and *battle against* in the BNC include negative phenomena. For example, *fight against terrorism*, *fight against crime*, *fight against cancer*, *fight against drug trafficking*, *fight against terrorism*, *battle against crime*, *battle against cancer*, *battle against inflation*, *battle against terrorism*. The indication, as with *war*, is that metaphorical *fight*s and *battle*s are not declared onto positively deemed phenomena and therefore, it can be argued that through such formulaic sequences, obesity is categorised as being semantically adjacent to problematic phenomena such as crime, terrorism and drugs.

In addition to identifying further socially divisive ideologies within OiBP, a third semantic macrostructure relating to *urgent action and intervention* has begun to emerge through the analysis of the *obesity war, fight* and *battle* metaphors. The word sketch analysis of *obesity* (see section 4.1) indicated that urgent action and intervention could be the basis of a semantic macrostructure in OiBP as the verbs which occur with *obesity* include such examples as *tackle, reduce, combat, prevent, treat* and *fight*. This analysis surrounding war-themed metaphors provides further evidence for this semantic macrostructure because concepts of war, battles and fights denote action to be taken against or in response to something. As demonstrated by the extracts in this section, these metaphors are utilised to articulate the actions being taken and actions to be taken *against* and *on* obesity. Therefore, the evidence suggests that the overarching narratives in British newspapers is obesity and people with obesity are problematic and action and intervention needs to be taken. This media narrative echoes the societal narrative surrounding weight and obesity. In western society there is a socially constructed ‘thin norm’ which fat people violate (Eller 2014: 219). The thin norm is socially equated with health and beauty and fatness is presented as the antithesis to this (Eller 2014: 220). The binary statuses that thinness and fatness currently have, which is perpetuated by metaphors such as the *obesity epidemic*, the *obesity timebomb* and the *obesity battle, fight* and *war* can create dangerous and unrealistic social ideals towards weight. This is because, the extreme, negative and hyperbolic language utilised to conceptualise obesity in these metaphors creates a culturally divisive frame and demonstrates that individuals who do not conform to the socially acceptable standards of weight are demonised and socially rejected.

4.4.2 Verb Variations of the War-Themed Metaphors

The remaining war metaphors to analyse and discuss are the collocate pairs which include verbs. Specifically, *obesity + tackle, obesity + tackling, obesity + fight* (when used as a verb),

obesity + combat, obesity + beat, obesity + fighting and obesity + battle (when used as a verb). Extracts 35-41 are examples of these metaphors in use.

Extract 35: The Guardian, 9th May 2013

Coca-Cola has announced plans to help **tackle obesity** by displaying the calorie counts of its fizzy drinks more visibly.

Extract 36: The Daily Mail, 15th June 2010

We're [medical researchers] only starting to learn about the complex body signals that make us feel hungry. If it were simple, we'd have had a safe and effective pill to **beat obesity** years ago.

Extract 37: The Daily Star, 12th August 2007

Scientists have unveiled a new weapon to **fight** childhood **obesity**.

Extract 38: The Daily Telegraph, 14th March 2014

Councils are to limit the number of takeaway's in a given area to help **combat** the **obesity** epidemic.

Extract 39: The Times, 1st January 2013

Every government department must play its part. If **tackling obesity** were as simple as telling people to eat less, we would have solved it by now.

Extract 40: The Sun, 1st July 2012

Indeed, the Government runs massive and costly programmes **fighting** **obesity**

Extract 41: The Independent, 16th April 2012

Medical experts join forces to **battle** rising **obesity**

The argument which has been made in the discussion of all the evidence presented in this chapter is that the prevalent metaphors in OiBP are dehumanising, socially divisive and generate us vs them implications. The final group of metaphors analysed in this section

provide further evidence for these arguments. The lexical items which comprise the metaphors, *fight*, *battle*, *combat* for example, like *war* discussed in section 4.4.1, connote the idea of two opposing sides. It is clear from the extracts in previous sections and extracts 35-41 that obesity and people with obesity are positioned as the opposition in the prevalent metaphorical wars in OiBP. In terms of exactly who and what is positioned against obesity and *fighting*, *tackling* and *battling* obesity, it can be determined from extracts 35-41 that this differs across the different metaphors. Examples include business corporations such as Coca-Cola in extract 35, the government is frequently positioned against obesity as detailed by extracts 38-40 and extracts 36 and 41 demonstrate how scientists and medical researchers are also positioned against obesity in these metaphors. To further explore the individuals and groups positioned against obesity and people with obesity, the concordance lines and the surrounding co-text of all the verb variations of the metaphorical collocate pairs under examination were analysed. Table 4.11 displays the frequencies with which the different individuals, groups or items are positioned against obesity within each different verb variation of the war metaphors under analysis. For example, the *obesity + tackle* metaphor occurs 2,127 times in OiBP. In 1,257, which equates to 59.1% of the instances in which this metaphor occurs, the government or a specific member or branch of the government is positioned against obesity and positioned as *tackling* obesity.

As detailed by the final column in Table 4.11, the government is the most frequent group positioned against obesity by a large margin, accounting for 65% of all the metaphors analysed in this part of the analysis. Scientists and medical professionals, in addition to businesses and organisations are also frequently positioned against obesity, collectively accounting for 19.9% of the metaphors analysed. Extracts 42-48 are further examples of how this division and opposition is expressed through these war metaphors.

Table 4.11: Individuals, Groups and Items Positioned Against Obesity in Each Specific War Metaphor

Individuals, Groups and Items Positioned Against Obesity in Each Specific War Metaphor								
	Tackle (n=2,127)	Tackling (n=837)	Fight (n=565)	Combat (n=554)	Beat (n=239)	Fighting (n=153)	Battle (n=49)	Total (n=4,524)
Government	1,257 (59.1%)	667 (79.6%)	420 (74.3%)	394 (71.1%)	114 (47.7%)	65 (42.5%)	23 (46.9%)	2,940 (65%)
Scientists and Health Care Professionals	250 (11.8%)	56 (6.7%)	35 (6.2%)	28 (5.1%)	42 (17.6%)	21 (13.7%)	14 (28.6%)	446 (9.9%)
Organisations and Businesses	230 (10.8%)	55 (6.6%)	60 (10.6%)	58 (10.5%)	20 (8.4%)	25 (16.3%)	6 (12.2%)	454 (10%)
Schools	220 (10.3%)	16 (1.9%)	16 (2.8%)	19 (3.4%)	22 (9.2%)	11 (7.2%)		304 (6.7%)
Society	120 (5.6%)	29 (3.5%)	22 (3.9%)	12 (2.2%)	12 (5%)	12 (7.8%)	1 (2%)	208 (4.6%)
Parents	50 (2.4%)	14 (1.7%)	12 (2.1%)	14 (2.5%)	10 (4.2%)		1 (2%)	101 (2.2%)
Food/Drugs				29 (5.2%)	19 (7.9%)	19 (12.4%)	2 (4.1%)	69 (1.5%)
Army							2 (4.1%)	2 (0.1%)

Extract 42: The Daily Express, 25th February 2010

Earlier this week, the **Scottish Government** unveiled a new drive to **tackle obesity**

Extract 43: The Times, 9th December 2006

NHS to fund dance classes to **fight obesity**

Extract 44: The Sun, 1st June 2012

The **government** and **NHS** spend a fortune **fighting obesity**

Extract 45: The Daily Express, 25th March 2014

Scientists have discovered a genetic switch that could **beat obesity**

Extract 46: The Independent, 19th April 2012

The Academy of Medical Royal Colleges this week launched a campaign to **combat obesity**, describing it as the single greatest health threat in the UK

Extract 47: The Guardian, 30th March 2014

Food and Drink Federation members remain focused on working through the Responsibility Deal to play their part in **tackling obesity**

Extract 48: The Sun, 5th March 2008

Hotel bosses are putting fruit and veg back on kiddies' menus in a bid to **battle obesity**

This aspect of the analysis adds to and supports the arguments made in this chapter in several ways. The first is that it provides further evidence for the emerging semantic macrostructures. The analysis of the verb variations of the war metaphors incorporated 4,524 more instances of metaphors into the collection of evidence. Verbs denote actions, and in the 4,524 verbs analysed for this portion of the analysis, denote actions to be taken against and towards obesity. Therefore, there are 4,524 more instances in which the proposed semantic macrostructure, *urgent action and intervention is required* is supported. In addition, it can be

argued that in the instances in which scientists and medical professionals are positioned against obesity in the metaphorical *fights* and *battles*, there is an additional, subsequent implication that *obesity is detrimental to health and the economy*. This is evident in extract 46, where ‘The Academy of Medical Royal Colleges’ is the group positioned against obesity through the verb *combat*. This specific group introduces notions of health into the narrative, and this notion is immediately reinforced by the second half of the extract which describes obesity as ‘the single greatest *health threat* to the UK.’ Evidence supporting this semantic macrostructure can also be found in extract 44 which explicitly broaches the subject of cost, stating that ‘The government and NHS *spend a fortune* fighting obesity’.

The additional 4,524 war-themed metaphors analysed in this aspect of the analysis also reinforce the argument that the metaphors have socially divisive implications. In addition to the verbs which carry hostile and divisive connotations and implications, it can be argued that the individuals and groups positioned against obesity in these metaphors reinforce the proposed socially divisive, us vs them ideologies. As detailed by Table 4.11, the primary individuals and groups positioned against obesity and people with obesity, collectively accounting for 84.9% of the metaphors analysed are, the government and government officials, scientists and medical professionals, business corporations and organisations. These are powerful and influential groups and it can be argued that as they have been appointed as those who will *fight* and *beat* obesity, the severity of the issue is elevated, thereby adding to the fear generated towards obesity. Through these metaphors, obesity is being depicted as an issue which warrants and attracts corporate, governmental and medical intervention.

Therefore, it can be argued that the ideologies of fear, threat and danger enforced by previously discussed metaphors such as the *obesity epidemic* and the *obesity timebomb* (see sections 4.3.2, 4.3.3 and 4.4.1) are present within these metaphorical constructions as well. In addition to the characteristics of fear and danger being enforced as a result of powerful and

influential groups positioned against obesity, the semantic connotations of each verb analysed also enforce these ideologies. *Tackle, tackling, fight, combat, beat, fighting* and *battle* have aggressive and confrontational semantic connotations. It can be argued that as a result of this, the ideologies of fear, severity and danger surrounding obesity are enhanced. This is because positive, safe and trivial issues do not usually warrant *fighting, battling* and *combating*.

As discussed in section 2.5 of the literature review, it is argued that when metaphors are used to a great extent, they become a natural aspect of the language surrounding the issue and the metaphorical status of the linguistic construction goes unnoticed by most of society (Semino 2008: 9). Therefore, it can be argued that the way in which the issue under discussion is conceptualised is altered as a result of the metaphors (Lakoff and Johnson 1980: 37-9). In terms of obesity, the evidence has shown that war is used as a source domain at a minimum of 5,549 times within OiBP. Referring back to section 4.4, due to the high number of collocates the lexical item *obesity* has in OiBP, only the war-themed collocates which appeared in the top 500 have been examined in this research. The extracts provided in this chapter have demonstrated that additional war-themed language such as *weapon* and *frontline* also appear in OiBP. Therefore, war is a pervasive source domain in metaphors used to conceptualise the issue of obesity. The result of this pervasive linguistic pattern, it can be argued, is divisive and negative attitudes towards obesity which, in addition to being naturalised aspects of the obesity media narrative, become naturalised aspects of the societal narrative towards obesity. In addition to being socially divisive, it can be argued that these metaphors dehumanise the issue of obesity. Obesity is an inherently human issue and the sociological impact of weight discrimination is complex, distressing and can be life threatening (see section 2.1 of the literature review). However, these metaphors arguably mitigate the human and sociological aspect of obesity and conceptualise the issue as an *epidemic*, a *timebomb*, a *war* and an issue to be *battled* and *fought*. As discussed in section

2.1 of the literature review, there is empirical evidence demonstrating how metaphors, specifically metaphors used in newspapers, affect and shape the perception readers have towards issues and social groups (Joffe and Haarhoff 2002; Thibodeau and Boroditsky 2011; Hendricks et al. 2018). In addition, Couch et al.'s (2015) audience reception research provided evidence that the media representation of obesity leaves people with obesity feeling ashamed and othered. Therefore, it can be argued that the dehumanising and socially divisive implications of the prevalent metaphors discussed in this chapter can have a considerably negative effect on public perceptions of obesity and people with obesity.

4.5 Chapter Conclusion

This chapter focused on the prevalent metaphorical concepts utilised in reference to obesity to fulfil a primary aim of the research which is to examine how obesity is conceptualised in OiBP. A word sketch analysis of the lexical item *obesity* revealed a prevalent pattern of two distinct metaphorical constructions which conceptualise obesity as an epidemic and a war, (see Table 4.3). The *obesity epidemic* appears 3,671 times across OiBP and a closer concordance analysis of these metaphors revealed three definitive ways in which this metaphor is constructed. The first is a direct reference to obesity (n=3,452), the second is blaming obesity for epidemics of other conditions such as heart disease and diabetes (n=189) and the third was a comparison to previous epidemics (n=25). In terms of the direct references to obesity as an *epidemic*, it is argued that this characterisation and the semantic connotations of *epidemic* dehumanise obesity, are socially divisive and generate implications of fear and imminent threat which misrepresent and stigmatise obesity. In addition, it is argued that this metaphor provides evidence for two emerging semantic macrostructures, *obesity is rising rapidly*, and *obesity is detrimental to health and the economy*. Both of these macrostructures misrepresent obesity and in section 4.3.3, comparisons between national obesity figures and the frequencies with which this metaphor is utilised across the 11 years

OiBP covers, detail and uncover the misinformation this metaphor perpetuates about the rate at which obesity levels are rising. It is argued that this misinformation further stigmatises obesity. When obesity is compared to and positioned as the cause of other diseases through the *epidemic* metaphors, further evidence is provided for the arguments that this metaphor is socially divisive (see section 4.4.4). It is argued that when obesity is portrayed as a catalyst for disease the negative semantic connotations and implications created by explicitly referring to obesity as an *epidemic* are amplified. This is because obesity is portrayed as culpable for these supplementary diseases in addition to being depicted as a fearful and threatening phenomenon on its own.

The specific war metaphors analysed in this chapter were identified from the top 500 collocates of the lexical item *obesity*. A total of 5,549 war metaphors comprised of nine different collocate pairs were collated for the analysis. The analysis was divided into two sections, nouns and verbs. The negative, divisive, dehumanising and misrepresentative implications of the *obesity epidemic* metaphors are further evidenced with the nouns, *timebomb*, *war*, *fight* and *battle*. *Timebomb*, like *epidemic* is used as a direct reference for obesity and people with obesity. It is argued the semantic implications of *timebomb* further perpetuates the inaccurate ideology that *obesity is rising rapidly* and generates further implications of fear and imminent threat (see section 4.4.1). In addition, it is argued that the violent and war-themed connotations of *timebomb* provide further evidence that socially divisive ideologies are present in the obesity media narrative. The socially divisive ideologies are further evidenced by the *obesity + war*, *obesity + fight* and *obesity + battle* metaphors. The concept of *war*, *fight*s and *battle*s involves two opposing sides and therefore, they explicitly position obesity against the rest of society. In addition, these nouns are frequently postmodified by prepositions which indicate opposition, *on* and *against* (see Tables 4.9 and 4.10). The *war on obesity*, the *war against obesity*, the *fight against obesity* and the *battle*

against obesity are prevalent linguistic patterns in OiBP and these specific constructions explicitly enforce divisive ideologies towards obesity and people with obesity.

The final war-themed metaphors analysed were the metaphorical constructions involving verbs. As verbs denote actions, it is argued that these metaphors provide evidence for a third emerging semantic macrostructure, *urgent action and intervention is required*. In addition, it is argued that these metaphorical constructions further perpetuate the socially divisive ideologies seen in the previous metaphors analysed. To explore this divide further, the concordance lines and surrounding co-text of the verb metaphorical constructions were analysed to determine exactly who and what is positioned against obesity and *fighting*, *tackling* and *battling* obesity. The results of this are displayed in Table 4.11 and they demonstrate that the government, businesses and organisations and scientists and medical professionals are the most frequent social actors positioned against obesity and people with obesity, collectively accounting for 84.9% of the concordance lines. It is argued that in addition to being socially divisive, this linguistic pattern further perpetuates the ideologies of fear and threat. The government, businesses, organisations, scientists and medical professionals are all powerful and influential groups and individuals. The fact that they are so frequently and consistently positioned as *fighting*, *tackling* and *battling* obesity increases the severity of the issue, further divides society and further stigmatises and misrepresents obesity and people with obesity.

After evaluating all of the evidence gathered in this chapter, it is clear that the prevalent metaphorical constructions in OiBP contribute towards three semantic macrostructures. These include, (i) *obesity is rising rapidly*, (ii), *obesity is detrimental to health and the economy* and (iii) *urgent action and intervention is required*. These ideologies and the prevalent metaphors in OiBP which conceptualise them are dehumanising, misrepresentative, socially divisive and generate us vs them implications. The high frequency with which they are used can result in

these misrepresentative and socially divisive ideologies becoming naturalised implications associated with obesity and people with obesity. The sociological impact of this is problematic. Obesity is a complex issue which sits at the intersection of science, health, sociology and psychology. It is clear from the evidence presented that the metaphorical constructions do not convey these complexities, but instead, simplify, problematise and sensationalise obesity. The current narrative perpetuated by these metaphors evokes fear, conceptualises obesity as a threat and is discriminatory towards weight. As detailed in sections 4.3.5 and 4.4.2, weight-based discrimination is serious and can detrimentally affect the physical and mental health of those affected (Ogden and Clementi 2010: 1-6). In addition, people with obesity have reported feeling shamed and othered by the media representation they receive (Couch et al. 2015). Therefore, the effect of prevalent language choices such as the *obesity epidemic* metaphor and war-themed metaphors needs to be carefully considered, particularly by large and influential platforms such as national newspapers.

5. Reproducing Scientific Discourse in Media Discourse: Turning Obesity Fact into Obesity Fiction

5.1 Chapter Introduction

The second analysis chapter explores the role of power and persuasion, specifically by examining the scientific and expert voices that are given a platform within media discourse about obesity. The media are a key conduit between the scientific community and the general public and act as a vessel in the dissemination of information (Williams 2011: 21). A predominant aspect of news reports about science is a linguistic notion called intertextuality. This is a concept which refers to the reproduction of one text in another (Wodak 2011: 630). This strategy is employed consistently throughout OiBP, and the intertextual components under analysis in this chapter include referencing and discussing the results of scientific research and the use of quotes and paraphrases from external sources. In section 4.1, the initial keyword analysis indicates that expert external sources are discussed, referenced and quoted, with social actors such as *Dr*, *researchers* and *experts* being amongst the top 50 keywords (see Table 4.1). Expanding this to the top 100 keywords, further evidence for the use of and reference to expert sources can be found with the presence of social actors such as *professor* and *scientists* (see Table 5.1).

Table 5.1: Expert Social Actors in Top 100 Keywords

N	Keyword	Frequency
43	researchers	4,775
45	experts	4,994
47	Dr	7,868
53	Professor	5,285
66	scientists	3,948
67	doctors	4,201

In addition to the high frequency with which these social actors appear within OiBP, there are multiple reasons as to why this is an interesting line of enquiry. Firstly, further exploration into their top 50 collocates (5R, 5L) revealed that these keywords are frequently used in conjunction with reporting verbs such as *claim*, *believe*, *say* and *warned* (see Table 5.2). Reporting verbs are verbs of speaking and thinking (Dehé 2014: 74) and within the context of this research, their prevalence indicates that scientific opinion and expert voices play a substantial role in shaping the obesity media narrative. In addition, the previous chapter demonstrates how journalists consistently use the *obesity epidemic* and the war-themed obesity metaphors to sensationalise, dehumanise and medicalise the issue of obesity. These metaphors are components of language chosen largely by the journalists themselves. In section 2.6 of the literature review, a study by Saguy and Almeling (2008) that compared obesity framings in news media against obesity framings in scientific journals was discussed. Their results revealed that obesity was framed as an *epidemic* and as a *war* three times more in news media compared to scientific journal articles (Saguy and Almeling 2008: 65), suggesting that the media dramatise scientific claims and facts. Analysing the scientific claims included in OiBP is an opportunity to expand on this argument. Finally, given that the media is the primary source in which the general public obtain the majority of their health-related knowledge (Clarke et al. 2003), it is important to analyse the information immediately available to them.

Table 5.2: Top 50 Reporting Verb Collocates of Keywords of Interest

Keyword	Collocates
researchers	<i>found</i> (n= 862), <i>said</i> (n= 543), <i>say</i> (n= 409), <i>according</i> (n= 141), <i>believe</i> (n= 135)
experts	<i>say</i> (n= 789), <i>said</i> (n= 428), <i>warned</i> (n=274), <i>believe</i> (n= 233), <i>warn</i> (n= 227), <i>claim</i> (n= 75)
Dr	<i>said</i> (n= 1,538), <i>says</i> (n= 902)
Professor	<i>said</i> (n= 891), <i>says</i> (n= 427)
scientists	<i>found</i> (n= 425), <i>say</i> (n= 320), <i>believe</i> (n= 212), <i>discovered</i> (n= 191), <i>said</i> (n= 191), <i>according</i> (n= 91)
doctors	<i>said</i> (n= 246), <i>say</i> (n= 188), <i>warned</i> (n= 148)

The linguistic patterns explored in this chapter are collocate pairs comprised of scientific and expert social actors and reporting verbs. As discussed, reporting verbs express speech and thoughts (Dehé 2014: 74). Although the verbs *found* and *discovered* do not express speech or thought, they indicate towards the reproduction and reporting of scientific research results, which falls within the category of intertextuality. Therefore, they have been included in this analysis. There are a total of 24 collocate pairs and collectively, they appear 9,886 times throughout OiBP. All 9,886 concordance lines and their surrounding co-text have been qualitatively analysed to establish if and how the scientific research surrounding obesity and the way in which it is recontextualised throughout OiBP affects the representation of obesity and people with obesity. In order to achieve this, the analysis focuses on four primary research questions:

- (i) What are the topics and messages introduced by and discussed by the expert social actors frequently referenced in OiBP?
- (ii) To what extent do these topics and messages support or counter the negative and sensationalised representation of obesity found in chapter 4?

- (iii) Is there further evidence for the three proposed semantic macrostructures identified in chapter 4?
- (iv) To what extent does obesity receive a fair and accurate representation as a result of this linguistic pattern?

5.2 Broadsheet vs Tabloid

During the process of analysis, OiBP was divided into broadsheet and tabloid sub-corpora to determine if one style of newspaper favoured the use of intertextual components more than the other. The SOCIAL ACTOR + REPORTING VERB collocate pairs under investigation appeared 9,886 times throughout OiBP in total. Once OiBP had been divided into broadsheet and tabloid sections, their frequency per sub-corpus was calculated, followed by their relative frequency per 10,000 words. These results can be found in Table 5.3. As demonstrated by the table, tabloid newspapers made greater use of intertextual components.

Table 5.3: SOCIAL ACTOR + REPORTING VERB Broadsheet vs Tabloid Frequencies

SOCIAL ACTOR + REPORTING VERB Frequencies Broadsheet vs Tabloid		
	Frequency	Relative Frequency (per 10,000 words)
Broadsheet	4,416	8.1
Tabloid	5,470	12.7

In addition, a further examination into the frequency with which both styles of newspapers use each individual collocate pair was also carried out. The results of this are detailed in Table 5.4. The results in this table demonstrate the frequency in which a collocate pair occurs in OiBP and the frequency in which a collocate pair occurs in the tabloid and broadsheet sub-corpora respectively. For example, the collocate pair *dr + said* occurs 1,538 times throughout

OiBP, 714 (46.4%) of which occur in broadsheet newspapers and 824 (53.6%) of which occur in tabloid newspapers.

Table 5.4: Collocate Pairs: Broadsheet vs Tabloid Frequencies

Collocate Pairs: Broadsheet vs Tabloid		
Collocate Pairs (n= 9,886)	Broadsheet	Tabloid
<i>researchers + found</i> (n= 862)	398 (46.2%)	464 (53.8%)
<i>researchers + said</i> (n= 543)	306 (56.4%)	237 (43.6%)
<i>researchers + say</i> (n= 409)	163 (39.9%)	246 (60.1%)
<i>researchers + according</i> (n= 141)	81 (57.4%)	60 (42.6%)
<i>researchers + believe</i> (n= 135)	66 (48.9%)	69 (51.1%)
<i>experts + say</i> (n= 789)	289 (36.6%)	500 (63.4%)
<i>experts + warned</i> (n= 274)	85 (31%)	189 (69%)
<i>experts + said</i> (n= 428)	250 (58.4%)	178 (41.6%)
<i>experts + warn</i> (n= 227)	57 (25%)	170 (75%)
<i>experts + believe</i> (n= 233)	66 (28.3%)	167 (71.7%)
<i>experts + claim</i> (n= 75)	10 (13.3%)	65 (86.7%)
<i>Professor + said</i> (n= 891)	509 (57.1%)	382 (42.9%)
<i>Professor + says</i> (n= 427)	181 (42.4%)	246 (57.6%)
<i>scientists + found</i> (n= 425)	188 (44.2%)	237 (55.8%)
<i>scientists + say</i> (n= 320)	142 (44.4%)	178 (55.6%)
<i>scientists + discovered</i> (n= 191)	64 (33.5%)	127 (66.5%)
<i>scientists + believe</i> (n= 212)	106 (50%)	106 (50%)
<i>scientists + said</i> (n= 191)	114 (59.7%)	77 (40.3%)
<i>scientists + according</i> (n= 91)	62 (68.1%)	29 (31.9%)
<i>Dr + said</i> (n= 1538)	714 (46.4%)	824 (53.6%)
<i>Dr + says</i> (n= 902)	309 (34.3%)	593 (65.7%)
<i>doctors + said</i> (n= 246)	168 (68.3%)	78 (31.7%)
<i>doctors + say</i> (n= 188)	83 (44.1%)	105 (55.9%)
<i>doctors + warned</i> (n= 148)	47 (32%)	101 (68%)

As demonstrated by Table 5.4, the extent to which broadsheets and tabloids utilise each collocate pair under analysis is very similar. Both newspapers favour ideologically neutral

reporting verbs such as *say*, *said*, *found* and *discovered*. Collocate pairs containing these verbs account for 87.8% (n= 3,878) of the concordance lines analysed in broadsheet newspapers and 81.7% (n= 4,472) of the concordance lines analysed in tabloid newspapers. These verbs are described as ideologically neutral because they do not have suggestive, alarmist or tentative connotations and do not offer an overt evaluation of the message they pre-modify (Harry 2014: 1046). The primary point of difference between newspaper styles can be found in the use of the alarmist verbs *warn* and *warned*. The verbs *warn* and *warned* have negative semantic connotations, are inflammatory and can be used to consciously infuse or mark the message in the original speech with an interpretive and subjectivised take (Harry 2014: 1046). The large majority (70.9%) of these verbs are used in articles printed in tabloid newspapers. This result is not unexpected as tabloid newspapers are recognised as being a more sensationalist style of newspaper (Cooper et al. 2011: 669). There are additionally some individual differences between the broadsheet and tabloid corpora such as broadsheet newspapers utilising the *scientists* + *according* collocate pair over twice as much as tabloid. However, broadsheet preference towards the social actor *scientists* or the verb *according* individually is not a repeated pattern. Overall, with the exception of the verbs *warn* and *warned*, broadsheets and tabloids behave similarly to each other concerning these collocate pairs.

5.3 Legitimation

In addition to analysing the messages introduced by the collocate pairs under examination, the extent to which the social position of the social actors referenced affects the rhetorical strength of the messages will also be explored. As discussed in sections 2.6 and 2.7 of the literature review, elite social actors are commonly used as sources in news discourse, a common argument being that their high social status influences the rhetorical strength of their statements (van Dijk 1998: 87; Calsamiglia and Lopez-Ferraro 2003: 162; Smirnova 2009:

86). Within the field of linguistics, the use of powerful sources to relay information and support arguments in discourse is a feature of a rhetorical strategy called legitimisation (Van Leeuwen and Wodak 1999: 104). Legitimation is a rhetorical tool employed to perpetuate and justify opinions and ideologies in discourse. The four key areas of legitimisation are; (i) *authorisation*, legitimisation by reference to authority (ii) *moral evaluation*, legitimisation by reference to value systems (iii) *rationalisation*, legitimisation by reference to shared social goals and (iv) *mythopoesis*, legitimisation through narratives of rewarding what is deemed to be a legitimate act and punishing what is deemed to be a non-legitimate act (Van Leeuwen 2007: 92). The aspects of legitimisation which are of particular pertinence to these results are authorisation and moral evaluation. Authorisation is explicitly realised through the use of quoting powerful and expert social actors to shape key messages. Moral evaluation is realised less explicitly through the semantic macrostructures created by the messages presented by the scientific and expert voices. An in-depth discussion of moral evaluation is provided in section 5.4. The collocate pairs introduced in section 5.1 underpin this analysis into the pervasive intertextual components within OiBP. Each collocate pair is comprised of a social actor and a reporting verb, for example *researchers + found*. It is through these collocate pairs that the legitimisation strategy of authorisation is realised. The individual roles that the reporting verbs and the social actor's play in enforcing authorisation are discussed in detail in the proceeding sections.

5.3.1 Authorisation Through Reporting Verbs

Quotations represent choices that carry social and rhetorical meanings, and these meanings can be enforced by numerous different linguistic structures, one of which is the specific reporting verb used in the quotation (Hyland 1999: 344). The role that the reporting verbs play in the collocate pairs is multifaceted. Firstly, they introduce speech, thoughts and actions carried out by individuals separate from the journalist. Additionally, the connotations they

carry can be ideologically influential regarding the message following the verb. As discussed in section 5.2, neutral *said*-based reporting verbs account for the large majority (84.5% n= 8,350) of the quotes analysed. These verbs have unbiased connotations and do not offer an overt or subjective perspective of the quote or argument that follows it. In addition, *found* and *discovered*, which introduce statements and descriptions of research results are matter of fact and offer no additional evaluative comment from the journalist. However, it can be argued that some of the reporting verbs under analysis do add to the ideological underpinnings of the ideas and messages they introduce. The connotations of the verb *warn* for example, semantically gives an indication to readers that the message following it is by some means negative or alarming and it can be argued that this can implicitly influence the way in which the message is interpreted by audiences.

Extract 1: The Daily Telegraph, 7th January 2016

Obesity will be “the new normal” within 20 years, **warn experts**

Extract 1 is an example of the *experts* + *warn* collocate pair in use and demonstrates how the specific reporting verb chosen can influence the overall implications of a statement. It can be argued that the overall implications of the statement in extract 1, similar to those of the metaphors analysed in the previous chapter, are fear and alarm. As *warn* is the only lexical item in this extract which explicitly incites alarm, the implications of the statement are largely induced by this verb. To compare, it can be argued that the statement would incite less fear and alarm if the verb *said*, which has more neutral semantic connotations, was utilised instead of *warn*. The verbs *warn* and *warned* are used in 6.6% of the concordance lines analysed and, the specific topics they are utilised in reference to are discussed in section 5.4.1. In addition to *warn* and *warned*, the semantic connotations of the verbs *claim* and *according* can also affect the implications of the message they introduce. van Dijk (1993b: 252) argues that quotes preceded by weak and speculative reporting verbs such as these

which have connotations of uncertainty, doubt and mistrust, allow journalists to distance themselves from the ideological stance of the statement. Parallel to the effects of inflammatory verbs such as *warn*, it can be argued that verbs with tentative connotations like *claim* can implicitly influence the way in which the message is interpreted by audiences.

Extract 2: The Sun, 19th July 2013

Teasing fat people about their weight makes them more likely to get bigger,

experts claim

Extract 2 is an example of an article engaging with the idea of weight stigma, which is an infrequent occurrence in OiBP (see section 5.5). In this specific example, a topic which challenges the dominant societal and media narrative surrounding weight is being discussed, but it can be argued that the connotations of ambivalence and doubt *claim* has undermines the statement to a certain degree (see section 5.5). Finally, the verb *believe* could be construed as having tentative semantic properties as beliefs are not synonymous with facts. However, it is argued that cognitive verbs such as *believe*, while having different reporting outcomes to verbs such as *said*, still carry a level of conviction as they implicitly invite the reader to adopt the perspective they represent (Verhagen 2005: 106 and Fetzer 2008: 355). Therefore, *according* and *claim* are the only reporting verbs under analysis which indicate any degree of uncertainty towards the message they introduce. These verbs only account for 3.1% of the quotes analysed, the remainder demonstrating no resistance or hesitation towards the ideologies in which they present.

5.3.2 Authorisation Through Social Actors

The rhetorical strategy of legitimisation involves propagating and legitimising ideologies. One method of achieving this is through authorisation which involves using powerful and knowledgeable social actors to enforce and validate particular arguments. The social actors within the collocate pairs under investigation do not share the same level of neutrality and

objectivity as the majority of their collocate verbs. van Dijk (2006: 375) argues that referencing individuals of a strong social position, and in a position of power can convince readers to accept the arguments being made. All of the social actors included in this analysis can be categorised as having a strong social position because they have or are perceived to have a high level of knowledge surrounding issues of weight and health. Using power and expert knowledge to add influence to an argument is a historical rhetorical strategy dating back to Aristotelian philosophy that has since been adapted and expanded by linguists. Aristotle argued that the education, intelligence and trustworthiness of a social actor increases the credibility of their argument and therefore increases the influence it has on recipients (Aristotle cited in Lawson-Tancred 2004: 75). In addition to the audience, there is empirical evidence suggesting that ideas and opinions from sources such as doctors and experts elicit trust and compliance from journalists as well. It has been documented through interviews with journalists that drawing on scientific opinion is a preferred method of obtaining information for a health-related story (Hansen 1994 and Leask, Hooker and King 2010). The two primary reasons for this are because it is not time consuming, so it caters to their stringent deadlines and because they trust the expertise of social actors such as *scientists* so do not feel the need to assess the credibility or validity of their results and statements (Hansen 1994: 123; Stryker 2002: 519). This evidence, in addition to the fact that tentative reporting verbs are not frequently used to introduce the ideas and opinions from these sources, suggests that the elevated position these social actors have within the social hierarchy seems to be mirrored in the rhetorical hierarchy of credibility and reliability (van Dijk 1988: 85). In addition to overtly and frequently recontextualising the words and opinions of elite social actors, journalists emphasise their power and expertise, or referring back to van Dijk's (1998: 267) ideological square, positive characteristics, through semantically powerful nouns and

adjectives. Table 5.5 demonstrates the power-enhancing lexical items which collocate (5L, 5R) with the SOCIAL ACTOR + REPORTING VERB collocate pairs under investigation.

Table 5.5: Power-Enhancing Collocates of the SOCIAL ACTOR + REPORTING VERB Collocate Pairs

Collocate Pair	Power-Enhancing Collocates
<i>researchers</i> + REPORTING VERB (n= 2,090)	<i>University</i> (n= 180), <i>College</i> (n=53), <i>Oxford</i> (n= 25), <i>Imperial</i> (n= 17), <i>Harvard</i> (n= 13), <i>medical</i> (n= 10), <i>Institute</i> (n= 6)
<i>experts</i> + REPORTING VERB (n= 2,026)	<i>health</i> (n= 247), <i>medical</i> (n= 39), <i>University</i> (n= 20), <i>nutrition</i> (n= 20), <i>leading</i> (n= 17)
<i>Dr</i> + REPORTING VERB (n= 2,440)	<i>lead</i> (n= 97), <i>Director</i> (n= 86), <i>author</i> (n= 84), <i>consultant</i> (n= 58), <i>chief</i> (n= 34), <i>leader</i> (n= 30), <i>University</i> (n= 29), <i>cardiologist</i> (n= 24), <i>senior</i> (n= 24), <i>head</i> (n= 22), <i>chairman</i> (n= 21), <i>psychologist</i> (n= 17), <i>specialist</i> (n= 17), <i>nutritionist</i> (n= 15), <i>president</i> (n= 14), <i>college</i> (n= 9), <i>executive</i> (n= 9), <i>chair</i> (n= 7)
<i>Professor</i> + REPORTING VERB (n= 1,318)	<i>University</i> (n= 87), <i>director</i> (n= 48), <i>author</i> (n= 33), <i>chairman</i> (n= 31), <i>specialist</i> (n= 28), <i>consultant</i> (n= 22), <i>president</i> (n= 22), <i>Sir</i> (n= 22), <i>lead</i> (n= 21), <i>epidemiology</i> (n= 19), <i>cardiovascular</i> (n= 12), <i>head</i> (n= 12), <i>psychology</i> (n= 11), <i>chief</i> (n= 11), <i>Harvard</i> (n= 9), <i>leading</i> (n= 9), <i>chair</i> (n= 8), <i>Oxford</i> (n= 8), <i>Imperial</i> (n= 7), <i>senior</i> (n= 7)
<i>scientists</i> + REPORTING VERB (n= 1,430)	<i>University</i> (n= 91), <i>Oxford</i> (n= 25), <i>College</i> (n= 23), <i>leading</i> (n= 16), <i>Cambridge</i> (n= 10)
<i>doctors</i> + REPORTING VERB (n= 582)	<i>Leading</i> (n= 17), <i>senior</i> (n= 14), <i>specialist</i> (n= 6), <i>president</i> (n= 4), <i>college</i> (n=3)

The adjectives used to modify the social actors, for example; *medical* researchers, *nutrition* experts and *leading* scientists add weight to their influence because they highlight and further enforce the social actors' specialist knowledge and competency onto the readers. The remaining nouns can be categorised as serving three primary functions. The first of which is

to highlight the institutions associated with the quoted social actors. *University, Oxford* and *Harvard*, for example. The collocates are organised on the basis of frequency and Table 5.5 demonstrates that when the quoted social actors are associated with institutions that are societally considered to be elite such as Oxford University, Harvard University and Imperial College London, this association is frequently emphasised. The second and third functions that the modifying nouns serve are closely related and they reinforce power through the use of titles and specialisms. Titles such as, *president, director, chairman* and *consultant* and nouns indicating specialisms such as *cardiologist, psychologist* and *specialist* fortify the social actors' elevated position in the social hierarchy, thereby *emphasising* their *positive characteristics* and enhancing their credibility and reliability. These findings demonstrate how the reference and predication strategies differ depending on the social actor or social group under discussion. The previous chapter detailed how obesity and people with obesity are conceptualised very negatively, using reference and predication strategies. References such as *epidemic* and *timebomb* and dehumanising metaphors which create implications of fear and threat which are used to *emphasise the negative characteristics* of obesity and people with obesity can be found in abundance (see sections 4.3 and 4.4). This results in a negative characterisation of obesity and people with obesity and incites negative and fatphobic ideologies surrounding weight. The references and descriptors used to conceptualise the social actors under discussion in this chapter are the antithesis of this. The results in Table 5.5 reveal how nouns and adjectives with positive semantic connotations which highlight the power, expertise, credibility and *positive characteristics* of the scientific and expert social actors are used to shape a positive representation for these individuals. This results in a positive characterisation for these sources. Referring back to section 4.4.2, scientists and medical professionals are one of the primary social groups positioned against obesity and people with obesity in the verb variations of the war-themed metaphors. It can be argued that

the overt positive representation this social group receives, juxtaposed with the explicit negative representation obesity and people with obesity receive in OiBP further perpetuates the socially divisive ideologies introduced in the previous chapter.

It can be deduced from Table 5.5 that, similar to Calsamiglia and Lopez-Ferraro's (2003) research discussed in section 2.6, power-enhancing collocates, particularly the use of titles and specialisms are more frequent with individual social actors, which in this portion of analysis are *dr* and *professor*. See extracts 3 and 4 for examples.

Extract 3: The Daily Telegraph, 9th May 2009.

"It will be tragic if it is not tackled," **said Dr** Tim Lobstein, the **director** of the Childhood Obesity Programme at the International Association for the study for Obesity.

Extract 4: The Guardian, 13th November 2010.

Professor Lindsey Davies, FPH [Faculty of Public Health] **president, said:**

"We are hopeful that engaging with the food industry will lead to changes in the quality and healthiness of the products we and our children eat.

The remaining social actors under investigation are groups of individuals, as indicated by the plural inflection -s; researchers, experts, scientists and doctors. In this context, a plural inflection implies a shared consensus towards the point under discussion. For example, in extracts 5 and 6.

Extract 5: The Times, 30th May 2015.

One in five cancer deaths is caused by obesity, which is on track to overtake smoking as the main cause of the disease, **doctors say**.

Extract 6: The Daily Telegraph, 5th June 2015.

It was previously believed that genetic faults could not be passed to future generations. But now **scientists** have **found** that in some areas of DNA, including those linked to mental illness and obesity, some of the faults remain in future generations.

An argument can be made that in this context, the plural inflection, *-s* acts as a grammatical indication of authentication towards the ideas being presented. Therefore, the social actors with the plural inflection do not need to be reinforced by power enhancing adjectives and nouns to the same extent that singular social actors might. Irrespective of the precise grammatical method, empowering and personifying the expert protagonists within a narrative can prime the reader to trust the story that follows it and there is an implicit suggestion that their expertise cannot be contested (Malone, Boyd and Bero 2000: 727).

Overall, through the rhetorical strategy of legitimisation, specifically authorisation, a large amount of apparently incontestable knowledge and power is asserted through the collocate pairs under investigation. The social actors whose words, opinions and research findings are being recontextualised maintain a high position within the social hierarchy and would be considered intelligent and trustworthy. Their power and prestige are reinforced by their collocate descriptions, which emphasise their *positive characteristics* and add further credibility to their points. It can be argued that this positive representation primes readers to support and authenticate the messages the social actors support and introduce. The next stage of analysis involves analysing the topics the scientific and expert sources discuss and determining which ideologies journalists have worked hard to linguistically construct support for.

5.4 Topics Introduced by the SOCIAL ACTOR + REPORTING VERB Collocate Pairs

To determine which topics scientists and experts are discussing, a qualitative analysis of all the SOCIAL ACTOR + REPORTING VERB concordance lines and surrounding co-text was carried out (see Table 5.6). The current literature surrounding intertextual components within health-related media discourse demonstrates that narrow and simplified representations which include sensationalised medical findings can be found in abundance (refer to section 2.6 of the literature review). The reductive and sensationalist ideas and depictions of issues pertaining to health can inadvertently stigmatise the condition under discussion and the individuals with it. A method through which inadvertent and implicit stigmatisation can be achieved is topic association. Discussing social groups and their relation to negative topics such as illness and a struggling economy can slowly contribute to social othering and polarisation (van Dijk 1998: 215). The topics presented and introduced by the prevalent collocate pairs have been determined as a result of a qualitative analysis (see Table 5.6). Examining these topics exposes a clear narrative; obesity is a pervasive and inherently negative phenomenon at an individual and societal level which needs to be promptly resolved. This narrative is parallel to the semantic macrostructures which emerged from the analysis in the previous chapter which state that (i) *obesity is rising rapidly*, (ii) *obesity is detrimental to health and the economy* and (iii) *it requires urgent action and intervention*. Table 5.6 details the topics discussed by scientific and expert sources and the frequency with which they occur. For example, out of the 9,886 concordance lines analysed, the topic *obesity can cause x* occurs 3,300 times equating to 33.4% of the total concordance lines. Broadsheet and tabloid newspapers engage with these topics at a similar rate and a more detailed table which provides the specific frequencies with which each topic is discussed in broadsheets compared with tabloids can be found in appendix 12. In addition to demonstrating the topic frequencies, Table 5.6 also highlights which, if any, semantic macrostructures the topics

discussed support. For example, the *obesity can cause x* topic supports the *obesity is detrimental to health and the economy* semantic macrostructure.

Table 5.6: Topics Discussed by the Scientific and Expert Sources

Topics	Total (n= 9,886)	Semantic Macrostructure
Obesity Can Cause X	3,300 (33.4%)	Detrimental to health and economy
Approaches to Health (Weight-Normative)	2,105 (21.3%)	Action is required
Causes of Obesity (Personal Responsibility)	1,506 (15.2%)	
Causes of Obesity (External Factors)	1,093 (11.1%)	
Prevalence	415 (4.2%)	Rates are rising rapidly
Burden on Public Resources	411 (4.2%)	Detrimental to health and economy
Approaches to Health (Weight-Inclusive)	340 (3.4%)	Action is required
Sugar Can Cause X	252 (2.5%)	Detrimental to health and economy
Pro Sugar Tax	142 (1.4%)	Action is required
Weight Stigma	132 (1.3%)	
Critiquing Government Strategies	58 (0.6%)	Action is required
BMI Paradox	65 (0.7%)	
Obesity Paradox	55 (0.6%)	
Pro Fat Tax	10 (0.1%)	Action is required
Against Tax	2 (0.02%)	Action is required

It can be determined from Table 5.6 that many of the topics discussed primarily support the *obesity is detrimental to health and the economy* and *urgent action and intervention is required* macrostructures. There are some topics which do not explicitly align with the semantic macrostructures already identified through the keyword, word sketch and linguistic analysis so far, for example, the different causes of obesity. In addition, other topics including *weight stigma*, *BMI paradox* and *obesity paradox* challenge the macrostructures which have

emerged so far. A full discussion surrounding the topics which challenge the dominant narrative surrounding obesity can be found in section 5.5. In terms of the different causes of obesity, it could be argued that this is evidence of a possible fourth semantic macrostructure. However, as the evidence accumulated so far through the keyword, word sketch and metaphor analysis has not indicated towards this, at this stage of analysis there is not enough evidence to definitively introduce a fourth semantic macrostructure surrounding the cause of obesity. It has been highlighted in the literature review and in the previous chapter that societally, there is a large element of personal blame, specifically laziness, lack of motivation and poor self-control associated with obesity (Grol-Prokopczyk 2010: 360). Therefore, identifying the media-constructed causes of obesity, particularly those linked to personal blame, and analysing the extent to which they relate to other predominant media messages such as *obesity is detrimental to health and the economy* would be valuable. This could add a further dimension to the legitimisation strategy of moral evaluation introduced in section 5.3. However, as the causes of obesity are not as predominant a message and theme in OiBP compared to *obesity is detrimental to health and the economy* and *urgent action and intervention is required*, moving forward topics relating to these macrostructures will be the topics analysed further. The in-depth analysis in this section will focus on the two most frequently occurring topics, *obesity can cause x* and *weight-normative approaches to health* which account for 54.7% (n=5,405) of the concordance lines analysed. As stated, these primarily contribute towards two out of the three semantic macrostructures which are, *obesity is detrimental to health and the economy* and *urgent action and intervention is required*. As issues relating to the economy are included in the first semantic macrostructure, *burden on public resources* concordance lines will be grouped together with *obesity can cause x* concordance lines for the proceeding discussion. There is an inherent link between these topics as obesity's *burden on public resources* relates to the NHS and is therefore a byproduct

of health issues obesity *can cause*. As these are the primary messages resulting from the intertextual aspects of OiBP, the remainder of the chapter will focus on them.

5.4.1 Obesity Can Cause *x* and Obesity is a Burden on Public Resources

One third (n= 3,300) of the discussions in the concordance lines and co-text analysed relate to the potential health implications which can accompany obesity. The primary scientific fact under discussion within these concordance lines is that weight gain and obesity, among many other factors such as age, genetics and social determinants of health, have been found to correlate with certain medical conditions such as heart disease, diabetes and cancer (Kissebah et al. 1982; Charles et al. 1993; Sullivan 2010: 315). The way in which this scientific fact is relayed in the media representation of obesity, under the guise of scientific and expert opinion is problematic for two primary reasons. The first centres around semantics. During the recontextualization process of this scientific fact, the relationship of correlation that obesity has with these diseases is simplified and distorted into a relationship of causation. A *correlation* is an association and relation between phenomena (Merriam Webster Online Dictionary 2019a). Conversely, *causation* is a relationship whereby something leads to a particular effect or result (Merriam Webster Online Dictionary 2019b). These two phenomena, *cause* and *correlation* bear some semantic similarities, but their core meanings are fundamentally different. Therefore, they cannot be utilised interchangeably with one another as they are not synonymous and the implications that they carry are too different. Despite the significant semantic disparities, they are often conflated in the news media representation of obesity. See extracts 7-12 for examples of this.

Extract 7: Daily Mirror, 5th December 2006

Fat alert in cancer forecast. **Cancer experts** yesterday **warned** rising rates of obesity **will lead to** an extra 300 Scots a year being diagnosed with **weight-related cancer** by 2010.

Extract 8: The Daily Telegraph, 21st May 2007

Dr Martin said people getting **fatter will lead to** an increase in the number of **cancer** cases.

Extract 9: The Daily Mail, 8th December 2009

THIRD OF HEART DEATHS BLAMED ON BEING TOO FAT.

A **THIRD** of **heart disease** deaths are **caused** simply by being overweight, **researchers** have **found**

Extract 10: The Guardian, 10th January 2014

"The obesity epidemic **is generating** a huge burden of **disease and death.**"

Said Dr Aseem Malhotra.

Extract 11: The Guardian, 10th May 2006

"A big concern we have is that the group of people **most likely to die** are the overweight who get **type 2 diabetes**, and sitting in the wings is a huge population of youngsters who are overweight and likely to get **type 2 diabetes**," **said Professor** Weissberg

Extract 12: The Daily Express, 2nd October 2012

Obesity is **fuelling** a British **diabetes** crisis, **experts** have **warned**.

All of the extracts contain linguistic constructions which denote causation as opposed to correlation. For example, *will lead to* in extracts 7 and 8, *blamed* and *caused* in extract 9 and *fuelling* in extract 12. This becomes problematic because ‘while it is well established that obesity is associated with increased risk for many diseases, causation is less well-established’ (Bacon and Aphramor 2011: 3). The ambiguity surrounding obesity’s precise role in these diseases and the scientific debate it stimulates is not acknowledged in these news articles. Therefore, statements which are founded in factual information are recontextualised in such a way that the fact under discussion arguably becomes a misleading fiction. Indicating a

simplistic, definitive relationship of causation further demonises weight and could lead to and inspire the stigmatisation of obesity. In section 4.3.4 it is highlighted that obesity is blamed for additional *epidemics*. It is argued that conceptualising obesity as an unquestionable driver for disease builds on the negative predication strategies uncovered previously and adds to the divisive and polarising representation of obesity and people with obesity. The same argument can be applied to this portion of analysis. The scientific fact under discussion in these quotes and paraphrases from scientific and expert sources is that obesity *amongst many other factors* can *correlate* with certain medical conditions such as heart disease, diabetes and cancer (Kissebah et al. 1982; Charles et al. 1993; Sullivan 2010: 315). As detailed by extracts 7-12, this is not the information relayed to the audience.

The second and arguably more severe issue of misrepresentation is the selective nature in which this particular fact is reported. Referring back to Reisigl and Wodak's (2001: 45) strategies of representation, intensification and mitigation, which involves the sharpening and toning down of certain aspects of an issue in order to generate a particular identity for social actors and groups can be seen here. At present, the dominant societal narrative portrays obesity as a primary driver of many diseases and this narrative is echoed in the media discourse representation of obesity. However, the reality is much more complex than this and within scientific and research contexts, there are multiple different factors, narratives and debates surrounding diseases and the role obesity plays in their aetiology. For example, BMI is one amongst a multitude of social correlates which can play a role in cancer. Others include race, age, socioeconomic status, social environment and stress (Gilman and Knox 1998; Hiatt and Breen 2008; Merletti, Galassi, Spadea 2011; Shiue 2014: 379). In addition, the extent of obesity's role in diabetes is debated as diabetes is also positively correlated with poverty, marginalisation and weight cycling (Holbrook, Barrett-Connor and Wingard 1989; Morris and Rimm 1992; Wamala, Lynch and Hornston 1999; Raphael et al. 2003). In

addition, weight stigma, independent of weight and body fat percentage, has been found to impact stress, blood pressure, blood fat levels, insulin sensitivity and visceral fat levels, thereby increasing the probability of some forms of cancer, cardiovascular disease and diabetes (Rosmand 2004; Thompson and McTiernan 2011; Tomiyama 2014; Hunger et al. 2015). As demonstrated, there are a multitude of determinants including socioeconomic status, race, age, stigma and weight cycling which are believed to significantly contribute to the diseases associated with obesity. Some scientists have even queried the extent to which fatty tissue, as an independent variable affects metabolic health. Studies which have analysed the effects of liposuction have found no improvements to health, providing evidence which could suggest that BMI is not an accurate indicator of health (Klein et al. 2004; Danilla et al. 2013). Finally, studies which have results that inculcate obesity as a primary driver for disease, and which often feature in news articles, are criticised in the scientific and research community for ‘rarely acknowledging factors like fitness, activity, nutrient intake, weight cycling or socioeconomic status when considering connections between weight and disease. Yet all play a role in determining health risk’ (Bacon and Aphramor 2011: 3). When studies do control for these factors, increased risk of disease disappears or is significantly reduced. It is likely that these other factors increase disease risk at the same time they increase the risk of weight gain (Bacon and Aphramor 2011: 3). These opposing scientific narratives, where obesity is not presented as the leading antagonist do not occur frequently and are largely mitigated from OiBP. Out of the concordance lines analysed, only 6% (n= 637) engage with these alternative narratives (see section 5.5 for a further discussion). The narrative which places obesity as a singular, indisputable driver for disease is intensified within OiBP. The result of this is misinformation and misrepresentation which can lead to negative and divisive attitudes towards weight, obesity and people with obesity.

The purpose of this section is not to argue that the correlation between obesity and diseases such as heart disease, diabetes and cancer is weak, as that is beyond the scope of this research. However, a brief review of the existing literature around the topic has revealed that ideas which are treated as fact and feature dominantly in the context of the obesity media narrative, are in fact contested within scientific and research contexts. However, this contestation is largely mitigated from OiBP (see section 5.5). The issue of obesity and its relationship with health and disease is one which has multiple different narratives, yet the media predominantly only engage with one of them. This singular narrative is not one which garners shared consensus amongst scientists and researchers and is not representative of all expert opinion. However, as the figures in Table 6.5 demonstrate, this narrative is propelled to the forefront of discussions surrounding obesity and health in OiBP and counter narratives are largely mitigated (also see section 5.5). Issues relating to health are complex and while newspaper journalists cannot be expected to fully comprehend the nuances and complexities of scientific debates, they have a responsibility to avoid misrepresenting an issue (discussed fully in section 5.6). Some of the most effective misinformation has always been that which has a kernel of truth to it (Wardle 2019: 88). As discussed, the claims made in OiBP relating to the associated health risks of obesity are based on scientific and factual information. It is the intensification and mitigation of certain information and elements surrounding the factual information, such as the other social determinants which impact disease, which leads to the severe misrepresentation found in this analysis. In addition to disregarding large aspects of the scientific debate, the narrative which the media do engage with is recontextualised in a simplified yet sensationalised manner and this is another way in which scientific facts become distorted into fiction. The ideology that obesity causes a myriad of ailments and diseases presupposes the wider societal belief that body fat is inherently negative. The negative association with high body fat in society extends beyond health to personality,

beauty, intelligence and many more factors. Therefore, the stigmatisation of it can have extensive negative repercussions. It is widely believed that stigmatisation on the basis of weight is valid because either the discriminators are concerned for the health of the individual or because stigma will motivate individuals to change (Puhl and Brownell 2001: 801). One answer to the question of why the health of individuals with obesity bears importance to other members of society is the NHS. The NHS is one of the most important and valued public services in Britain and therefore, any phenomena which illustrates a potential threat to it will characteristically be deemed negative.

Extract 13: The Daily Mail, 18th May 2011

Doctors have **warned** that the problem [obesity] is an ever-growing **burden on the NHS** and is **jeopardising the health** of the next generation.

Extract 14: The Daily Telegraph, 28th September 2011.

Doctors warned that the **health service** could "**collapse** under the pressure" as poor lifestyles led to **heart disease, strokes, cancer and other long-term conditions**.

Extract 15: The Sun, 13th August 2008.

The **NHS** will become **unaffordable** unless "lifestyle" conditions such as **diabetes** and **obesity** are prevented, **experts warn**.

Extract 16: The Times, 17th April 2008

Helping the obese lose weight will **save lives** but create **extra costs**, says **Dr Thomas Stuttaford**

Extract 17: The Daily Telegraph, 16th June 2014

Experts warn that the **cost of treating overweight and obese patients** could rise to at least **£10 million** a year as the nation's waistlines continue to expand.

As discussed in section 5.3, moral evaluation is legitimisation by reference to value systems (Van Leeuwen 2007: 92). Unlike authorisation which can be explicitly realised through social actors and reporting verbs, moral issues surrounding a topic may not be explicitly enforced through lexical items such as *good*, *bad*, *evil*, or *virtuous* (Van Leeuwen 2008: 110).

Discourses on moral values are implicitly realised through lexical items that denote motives such as health, hygiene, benefit and normality (Van Leeuwen, 2008: 110). Therefore, Van Leeuwen (2008: 110) argues that cultural contextual knowledge is an essential aspect of identifying the legitimisation strategy of moral evaluation. Health is a value system and one which is arguably more valuable in the Britain because of the great public dependence on the NHS. When discussing issues related to health in the UK, it is inevitable that conversations surrounding the NHS will closely follow. Extracts 13-17 are examples of this. The negative association which is created around weight is further reinforced when explicit references to the impact on the NHS, a public tax-funded health service are made. The legitimisation strategy of moral evaluation becomes apparent here, nouns such as *burden*, adjectives such as *unaffordable* and verbs such as *collapse* incite fear and promote the ideology that obesity is a threat to the NHS. Specifically, the NHS is portrayed as being threatened by certain individuals in society. Individuals which, referring back to Table 5.6, are depicted as being personally responsible for their obesity and their *inevitable* obesity related health issues 15.2% of the time. Extracts 14 and 15 are good examples of this as they explicitly refer to obesity and its associated conditions as *lifestyle* diseases and conditions. Therefore, blame is placed on to individuals with obesity, building on the negative predication strategies found in the analysis so far and creating further distortion and stigmatisation. As previously mentioned, the role of lifestyle in the aetiology of these conditions is complex and debated but simplified in news discourse for sensationalist effect. When obesity's associated health conditions are discussed in conjunction with the impact it could have on the NHS as they are

in extracts 13-17, it further reinforces negative associations in an overt manner. The issue of factual distortion and misinformation is present here too. It is common knowledge and a fact that the NHS service is fiscally fragile. However, in the news media representation of obesity, obesity is represented as an unquestionable catalyst for disease and a *burden* on this valued public service. As previously discussed, the precise causes of the diseases associated with obesity is complex, therefore, obesity and individuals with obesity cannot be assigned with the central blame. Allocating blame in this way further falsifies factual information and stigmatises individuals with obesity.

Scientists and experts who are given a platform in British news media repeatedly represent obesity as a detrimental threat to one's health, thereby labelling any individual whose BMI is above 30 as unhealthy. This ideology is simplistic and disputed but is authenticated through the powerful social position of the speakers and the supportive reporting verbs which follow them. The final aspect of discussion in this section is centred around verbs *warn* and *warned*. These verbs have inflammatory and alarmist connotations and indicate that the message following them is negative. When journalists employ these verbs, they do so in reference to the topics, *obesity can cause x* and the *burden on public services* 60.3% of the time. This figure is almost twice as much as the mean percentage in which the other prevalent reporting verbs analysed are used to refer to these two topics (34.4%). As discussed, these topics relate to the semantic macrostructure, *obesity is detrimental to health and the economy*. It has been argued that the linguistic evidence discussed so far which contribute towards this macrostructure, the *obesity epidemic* metaphor and the quotes and paraphrases from scientific and expert sources, are sensationalist and misrepresentative. The misrepresentative and sensationalist aspect of this macrostructure are further exacerbated by the frequent use of the verbs *warn* and *warned*. This is because it can be argued that the semantic connotations of these specific verbs incite more fear and anguish towards obesity which can intensify and

inflammation the message they introduce, further distort factual information and further stigmatise obesity.

The results discussed so far have revealed a specific but fundamentally flawed narrative is shaped which places individuals in a central culpable position regarding obesity, the medical conditions which, as portrayed in OiBP, will inevitably follow and the fiscal fragility of the NHS service. This is achieved by intensifying narratives which position obesity as a singular, incontestable aggravator for disease and mitigating narratives which oppose this. This can inspire the simplistic belief that body fat over a certain level is dangerous and inherently negative. This ideology is challenged and contested in scientific contexts, but the media representation does not frequently engage with this aspect of the fact under discussion. In addition, as the diseases associated with obesity are complex, obesity cannot receive exclusive blame for the monetary struggles of the NHS. However, as demonstrated in the extracts provided, the complexity of the situation is not disclosed and therefore, obesity and people with obesity receive a negative representation. These misrepresentative messages are authenticated by scientific and expert voices and they create a singular narrative, one that most audience members will not have the knowledge to question or contest.

5.4.2 Weight-Normative Approaches to Health

The simplistic singular narrative discussed in relation to the *obesity can cause x* and *the obesity is a burden on public resources* topics is mirrored when journalists discuss topics related to approaches to health. The second most frequent topic discussed by journalists, accounting for 21.3% of the concordance lines analysed is *weight-normative approaches to health* (n= 2,105). At present, the overarching societal view of obesity, a view which is also reproduced in this corpus, is that obesity is a deadly phenomenon for which weight loss is the antidote. A *weight-normative* approach to health is one which places an ‘emphasis on weight and weight loss when defining health and wellbeing’ (Tylka et al. 2014: 1). Therefore, in this

analysis discussions surrounding weight loss and the promotion of ideas, behaviours or medication aimed at controlling weight are categorised and placed into the *weight-normative approaches to health* topic. Weight management is a central aspect of health improvement and health care regimes in westernised societies (Bacon 2006: 40; Tylka et al. 2014: 1). The role of body weight and body fat percentage in the aetiology of diseases, as discussed in section 5.4.1, is contested, questioned and non-conclusive. As a result of this, the role of weight management and the popular measures taken to achieve a certain weight or BMI are highly contested by many researchers, arguing that the generalised focus on weight and weight loss can be linked to diminished health as opposed to better health. (Bacon 2010; Bacon and Aphramor 2011; Tribble and Resch 2012; Watkins, Farrell and Doyle-Hugmeyer 2012; Tylka et al. 2014). However, despite this debate, as detailed by the results in Table 5.6 and by extracts 18-23, weight-normative approaches to health, whereby methods of controlling and reducing weight are promoted are abundant in OiBP. The methods of weight loss and weight control suggested by scientific and expert voices in British newspapers are wide ranging and include medical interventions, environmental interventions, behavioural interventions and the fetishisation and vilification of certain foods. See Extracts 18-23.

Extract 18: The Daily Telegraph, 9th July 2012

The "flab jab" has had promising results in early studies and if it passes further safety trials, **scientists believe** it could be a revolutionary weapon against obesity.

Extract 19: The Guardian, 6th September 2013

Bugs that lurk in the guts of slim people could be turned into radical new therapies to treat obesity, according to a study [...] The **scientists found** that mice stayed slim when they received faecal transplants from slim women.

Extract 20: The Daily Mail, 21st August 2006

CLOTHES for fat children should have health warnings urging them to lose weight, an obesity **expert said** yesterday. **Professor** Mike Lean **believes** labels advising parents to take overweight children to their doctor should be incorporated into trousers with big waistbands and shirts in larger sizes.

Extract 21: The Daily Express, 22nd March 2010

SEAWEED could hold the key to conquering obesity, **experts believe**.

Their research shows that it can stop the body absorbing up to three-quarters of the fat in a meal.

Extract 22: The Daily Mail, 13th March 2006

Going vegetarian could be the key to losing weight, research suggests [...]

Professor Tim Key **said**: ‘We found the lowest weight gain came in people with a high intake of carbohydrate and a low intake of protein

Extract 23: The Daily Mail, 15th June 2007

Severely overweight children should be taken from their parents and put into care, **doctors said** yesterday

As demonstrated by these extracts, multiple weight loss methods and methods of weight control are promoted by scientific and expert voices in British news media. The ideology that a lower weight is synonymous with better health encourages diet behaviour and mentalities. There is a vast amount of data providing evidence that diets and weight loss attempts are unsuccessful in terms of longevity between 80-98% of the time and most commonly result in weight cycling (Stunkard and McLaren-Hume 1959: 83; Kassirer and Angell 1998: 53; Brownell and Rodin 1994: 1325; Wing and Phelan 2005: 222). Weight cycling has been linked to an increase in stress hormone levels, blood pressure levels, blood fat levels and insulin sensitivity, variables which can contribute to diseases such as cancer, diabetes and

heart disease (Rosmand 2004; Diaz, Mainous and Everett 2005; Thompson and McTiernan 2011; Sumithran and Proietto 2013; Tomiyama 2014; Hunger et al. 2015). In addition to physical health, mental health can be negatively affected by dieting and weight cycling. Factors such as happiness, beauty and increased self-esteem are commonly associated with lower weights (Tylka et al. 2011: 4). However, it has been documented that the process of weight cycling and perceived failure in obtaining these ideals can lead to poor psychological outcomes including depression and low self-esteem (Osborn et al. 2011: 278; Olson et al. 2012: 144). Finally, the weight loss imperative, a core aspect of weight-normative approaches to health, has been positively correlated to increased societal and internalised weight stigma and disordered patterns of eating (Haines et al. 2006; Puhl, Moss-Racusin and Schwartz 2007; Bacon and Aphramor 2011).

Reisigl and Wodak's (2001) representation strategy of intensification and mitigation can be found within this topic as well. The significant failure rate of weight-normative approaches to health and their potentially grievous health and sociological outcomes are mitigated from the dominant narrative in OiBP. The risks associated with the weight-normative approaches to health are not too dissimilar from some of the health risks associated with obesity, yet they are not frequently discussed within the context of the weight-normative approaches to health topic. An interesting inconsistency in reporting to note is that the risks associated with obesity feature dominantly in the primary narrative shaped by the media, are intensified and made abundantly clear to readers. However, in terms of weight-normative approaches to health, which is the second most frequent aspect of the dominant narrative (see Table 5.6), the notion of its associated risks is mitigated and rarely entertained. This evidence supports van Dijk's (1998: 267) ideological square model as when a phenomenon which is perceived negatively such as obesity is discussed, aspects reinforcing this perception such as its associated health risks, or *negative characteristics*, are *emphasised* and feature at the

forefront of the discussion. In contrast, when weight management and weight loss, socially celebrated phenomena are discussed, aspects which could weaken the positive perception such as its associated health risks, or *negative characteristics* are *de-emphasised* and backgrounded. Therefore, through the rhetorical strategy of positive self-representation and negative other representation, whereby risks to health are either emphasised or de-emphasised, obesity receives an adverse representation and conversely, weight-normative approaches to health receive a positive representation. These representations are authenticated and implicitly deemed incontestable by the scientific and expert voices that introduce them. The research disputing and highlighting the potential dangers of weight-normative approaches to health exists and the ideas foregrounding the debate have been present within research contexts for over 50 years. However, as can be deduced from the evidence presented in this chapter, the media habitually overlook it by discussing research and quoting scientists and experts whose views align with the narrative in which journalists are shaping. Therefore, it can be argued that this is a demonstration of biased perceptions towards obesity and weight as risks to health are only discussed under certain contextual circumstances. In addition, the emphasis and de-emphasis of certain relevant facts results in a distorted portrayal of weight-normative approaches to health. As a result, facts under discussion are misrepresented and arguably become fiction. It is argued that irrespective of their efficacy, weight-normative approaches to health intrinsically stigmatise weight and obesity as they promote the ideology that certain body weights are inferior and in need of fixing (Bacon and Aphramor 2011: 9, Tylka et al. 2011: 13). The misrepresentation these approaches receive and the lack of arguments which challenge the dominant narrative in British news media reinforces and enhances the stigmatisation of weight.

5.5 Challenging the Dominant Narrative

To *contradict* means to ‘imply the opposite’ or ‘assert the contrary of’ (Merriam Webster Online Dictionary 2019c). ‘Contradictions are pervasive in our interpersonal life and they are particularly visible when strong beliefs come into play’ (Berliner 2017: 45). In addition, they have a ubiquitous presence in the media. When analysing this data and reading the existing research in this area, it became apparent that within the context of media discourse contradictions can occur at two different levels; at a microlevel and at a macrolevel.

Referring back to the literature review, previous research has demonstrated that contradictions in news stories can be found in abundance. Goldacre (2009: 848) gave an example of a health reporter for *The Daily Mail* writing an article stating that red wine could be used as a preventative measure towards breast cancer, only to write an article three months later making the opposite assertion (see section 2.5 of the literature review for more examples.) These examples that include individual and specific phenomena such as red wine could be described as microlevel contradictions. In terms of obesity, there are elements to the narrative which, at a microlevel are subject to change, such as specific foods or behaviours that encourage weight loss and the exact economic cost of obesity. However, these micro changes and contradictions within the narrative do not change or affect the broader semantic macrostructures within it. For example, advocating different methods of weight-normative approaches to health, even when some methods contradict each other, still promotes the ideology that urgent action and intervention in the form of weight loss and weight management is required. Examples that could affect the predominant semantic macrostructures within a narrative include wider categorical contradictions. Applying this theory to the issue of weight and health, this would refer to reporting on research or quoting scientists and experts who challenge the existing mainstream scientific theories. Challenges and contradictions which take this form and have the power to alter semantic

macrostructures, can be referred to as macrolevel contradictions. Currently, the mainstream and central messages or semantic macrostructures surrounding obesity in British newspapers are, (i) *it requires urgent action and intervention*, expressed through militaristic metaphors (see chapter 4) and through the use of scientific research and voices (ii) *obesity is detrimental to health and the economy* and (iii) *obesity levels are rising rapidly*, both of which are expressed through the *obesity epidemic* metaphor (see chapter 4) and additionally through scientific research and voices. Taking examples that are present in OiBP, notions and theories that would contradict and challenge the mainstream existing theories at a macrolevel include non-diet, weight-inclusive approaches to health, the obesity paradox, the BMI paradox and weight stigma. These phenomena affect the overall narrative surrounding the issues of obesity, weight and health and could, if discussed frequently enough, influence the broad semantic macrostructures in OiBP. However, as detailed by Table 5.6 and the proceeding discussion, these narratives are largely mitigated from news reports about obesity. Non-diet, weight-inclusive approaches to health dismantle the popular notion that calories and exercise need to be rigidly monitored in order to achieve good health. Within the concordance lines analysed for this portion of the analysis, 3.4% (n =340) are categorised under the topic of *weight-inclusive approaches to health*. Therefore, these theories and approaches to health receive almost seven times less coverage than weight-normative approaches to health (n= 2,105) (see Table 5.6). Extract 24 is an example of a quote categorised under the topic of weight-inclusive approaches to health.

Extract 24: The Daily Mail, 7th June 2011

Some **experts** even **say** the strain that repeated weight loss and gain places on the body means most people would be better off not dieting at all.

The BMI paradox argues that BMI is an arbitrary measure of health and therefore, arguments made concerning the dangers of obesity and the prevalent ideology that reducing body fat and

BMI is essential are challenged. Out of the concordance lines analysed, 0.7% (n=65) advocate the BMI paradox.

Extract 25: The Independent, 21st September 2006

Three months ago, **researchers** at Loughborough University **said** that BMI was a "dreadfully imprecise measuring tool" for youngsters because they grow at different rates

The obesity paradox, closely related to the BMI paradox, challenges the belief that all people with obesity are unhealthy. There are 55 quotes, accounting for 0.6% of the concordance lines analysed that endorse this ideology.

Extract 26: The Times, 30th August 2013

However, writing in The Lancet Diabetes & Endocrinology, **experts say**:
"Results from several prospective studies show that only obese, unfit individuals, but not obese, fit individuals, are at higher mortality risk than are normal weight fit individuals."

Finally, acknowledging weight stigma humanises the issue of obesity and contests the dogma that people with obesity are problematic. Weight stigma is discussed in 1.3% (n= 132) of the concordance lines analysed.

Extract 27: The Independent, 11th September 2014

"There is no justification for discriminating against people because of their weight," **said** lead author **Dr** Sarah Jackson.

These extracts provide evidence that macrolevel contradictions and challenges to the dominant narrative are present in British newspapers. However, as Table 5.6 demonstrates, these phenomena are largely omitted from the narrative, and only account for 6% of the research, quotes and paraphrases analysed in OiBP. Due to the infrequency with which these contrasting theories are discussed, the overall semantic macrostructures within the narrative

remain unaffected. A widely contended argument is that scientific and medical information that is unusual and controversial is deemed newsworthy by journalists (Hansen 1994: 114-5; Stryker 2002: 521). However, it is clear from the evidence discussed in this chapter that predominantly, only microlevel controversies and dissensions such as the best diet for weight loss are published. Journalists rarely deviate from the dominant narrative at a macrolevel thereby intensifying and solidifying the pervasive semantic macrostructures surrounding the obesity debate. Repetitive semantic macrostructures become normalised and can have an extensive effect on perceptions of social groups (van Dijk 1998: 244). In addition, van Dijk (2006: 362) argues that discourse can be successfully manipulative and persuasive when the recipients lack the specific knowledge needed to challenge or resist it. Obesity, weight and health are issues which are complex and in order to fully comprehend them, expert knowledge in a variety of fields within science and medicine is required. The large majority of the general lay public do not have this. Therefore, it can be argued that information given to them in the media by powerful and knowledgeable sources such as scientists and experts can successfully persuade them into belief and compliance. Regarding the media representation of obesity, this is problematic because the dominant narrative, one which the public are arguably compliant with, is rich with inaccuracies and misinformation.

5.6 Journalistic Motivations and Procedures

After examining the results of the analysis, many questions surrounding the motives of journalists arise. Misrepresentation is extensive, but as discussed, specific and specialised knowledge is required in order to identify and challenge it. Journalists, including health journalists may not necessarily have this required knowledge. Therefore, an argument can be made that the intensification and mitigation of certain scientific theories and approaches to health, is a result of ignorance towards the issue as opposed to biased ideologies. However, as discussed in the previous section, the ideas and research which challenge the mainstream

obesity related ideas and theories are pervasive in research contexts and, whilst predominantly mitigated from the obesity media narrative, do have a small presence (see section 5.5). If research that challenges the dominant narrative surrounding weight and health exists and has been reported on in the past, the probability that ignorance is the key factor in the question of why misrepresentation occurs decreases. Therefore, questions concerning why alternate theories receive less press coverage and why researchers advocating for them are not approached to give comments on the issue need to be asked. These are complex questions with multifaceted answers. A review of research into journalistic procedures and motivation with particular focus on stories pertaining to health revealed that there are multiple factors which play a role. The primary components which affect the content of health-related stories include (i) newsworthiness (ii) time constraints (iii) press releases.

Two issues which have a significant impact on the content of newspaper articles are issues of time constraints and a concept labelled ‘newsworthiness’ (Östgaard 1965: 50-51). Writing an article about complex scientific and medical phenomena in a coherent manner to facilitate a non-specialist audience is a challenging task. It is also time-consuming task and therefore, utilising quotes from scientists and expert sources whom journalists deem credible and trustworthy in place of researching the issue further themselves is common practise in health media discourse (Hansen 1994; Leask, Hooker and King 2010). The expert knowledge of these sources and the high position they have within the social hierarchy serves as validation for their arguments and it has been reported that as a result of this journalists do not question their statements. (Hansen 1994: 123; Stryker 2002: 519). In addition to stringent deadlines, journalists are driven by a commercial imperative to create articles that will facilitate sales as opposed to educate the public (Leask, Hooker and King 2010: 2). Interviews with journalists have revealed that ‘due to tight deadlines, quick turn arounds and pressures to create stories that will entertain, little background research is carried out and journalists will regularly

sensationalise stories’ (Leask, Hooker and King 2010: 2). Sensationalising and dramatising issues enhance the newsworthiness of a story. Östgaard (1965: 50-51) argues that a news item is deemed ‘newsworthy’ if it has some interest or importance to readers or if it is or can be made ‘sufficiently exciting’. In terms of scientific research, articles whose results could generate widespread attention and ‘buzz’, are deemed newsworthy. (Hansen 1994: 114-5). Aspects which are arguably more important such as a rigorous methodology and the impact level of the journal an article is published in come second to provocative results. (Leask, Hooker and King 2010: 4). Portraying obesity as an antagonist in the story of health, while simplistic and inaccurate in scientific contexts is newsworthy and caters to the drama news media thrives on. In addition, weight-normative approaches to health further vilify obesity and offer opportunities for journalists to introduce unusual, distinctive and newsworthy variations such as seaweed and faecal transplants, as demonstrated in the extracts provided in section 5.4.2.

Stryker (2002: 528) argues that ‘the news media are not solely responsible for the disparity in attention paid to particular medical research; some medical journals also contribute to this by issuing press releases for articles that possess the characteristics journalists are looking for, thereby further highlighting their importance’. This indicates that the journals in which scientific research is published play a significant role in terms of the research results that get published in newspapers. This phenomenon was discussed in Saguy and Almeling’s (2008) study into the reproduction of obesity related scientific information in American, Canadian and British newspapers. Their analysis revealed that inflammatory linguistic constructions such as *epidemic* and *war* metaphors were found in press releases and reproduced in media discourse (Saguy and Almeling 2008: 76) (see section 2.6 for an in-depth review). In addition, Hansen (1994: 114-5) interviewed British science journalists and discovered that ‘specialist journalists are bombarded daily with a mass of press releases, letters, promotional

material, and telephone calls from individuals or institutions anxious to get coverage.’ This implies that the likelihood of research receiving press coverage is predicated on whether promotional material such as a press release is provided for journalists. This, in conjunction with time pressures and pressures to create lucrative newsworthy stories, contributes towards the story selection process undertaken by journalists for each article they write. Therefore, producing accurate and fair representations of an issue becomes difficult as these stories may not be as ‘newsworthy’, and they may require more independent research from the journalist. Having newsworthiness and capital gain as primary drivers behind story selection is problematic because, while it results in an abundance of memorable and interesting stories, it also results in a representation which is both inaccurate and inadvertently stigmatising towards obesity and individuals with obesity.

It is clear that responsibility for the misrepresentation of obesity cannot solely be placed on journalists or even newspapers. The issue of misrepresentation is systemic, and the dominant narrative found in news discourse is parallel to and arguably a reduplication of the dominant societal narrative surrounding weight and health. The evidence seems to suggest that news reports on specific scientific research are largely predicated on press releases which are issued by academic journals. These journals and the researchers featured within them often answer to and are funded by businesses and government agencies. Therefore, an argument can be made that the news media are merely a vessel in which to promote and facilitate the wider agenda of powerful third-party organisations and play a lesser role in the societal misrepresentation of obesity. Fully investigating the extent to which this theory is accurate is beyond the scope of this research. However, it can be deduced from this analysis that an aspect of misrepresentation the media are accountable for and have to take responsibility for is the selective and sensationalised version of research and science they present. Previous research has shown that this is common practise (Hansen 1994; Saguy and Almeling 2008;

Leask, Hooker and King 2010). Journalists will favour bizarre results over academic rigour and take aspects of research, recontextualise and dramatize it to make it newsworthy. Journalists argue that their role is not to dismantle inaccurate representations, 'educate the public or make the public scientifically literate, but a rather more modest role of supplying interesting, informative, and entertaining coverage' (Hansen 1994: 127). This a cogent argument with some validity, newspapers are a business whose success relies on the sale of their papers, therefore they have to sell the stories within them. However, news media have a large platform, their words reach millions of individuals and the argument that their role is just to entertain fails to consider the impact their stories have. Misrepresenting the issue of weight and obesity to the extent that it is misrepresented in British news media can have adverse repercussions. Currently, obesity receives a negative representation, this representation can induce biased attitudes and opinions which can lead to stigmatising actions and behaviours. It is argued that weight stigma is the last socially acceptable form of discrimination (Stunkard and Sorensen 1993: 1037; Puhl and Brownell 2001: 788). In addition, section 2.1.2 of the literature review details the wide variety of detrimental and stigmatising acts associated with weight discrimination such as verbal taunts and physical acts of violence. This is a pervasive issue and the physical and psychological effects of weight stigma can be detrimental. The way in which weight is viewed in society can have a positive impact in reducing biases which instigate discrimination. The news media, whose platform is one of the largest and widest reaching is an important place to start shifting perceptions. It is the contention of this research that perhaps relying on press releases from academic journals is not the most effective method of story selection and the effects of sensationalising the material which is selected for a story should be considered before publication.

5.7 Chapter Conclusion

This chapter explores the intertextual role of power and persuasion by examining the pervasive scientific and expert voices that are given a platform in British obesity related newspaper articles. It is clear from the keyword list that journalists made reference to scientific and expert social actors as the lexical items, *doctors*, *dr*, *scientists*, *experts*, *researchers* and *professor* all appeared within the top 100 keywords. Further exploration into the collocates (5R, 5L) of these social actors revealed that reporting verbs such as *said*, *warn* and *believe* frequently co-occur with the prevalent social actors within OiBP. These results indicate that scientific and expert voices play a key role in shaping the key messages within the obesity media narrative. Overall, from the top 100 keywords and their top 50 collocates, 24 collocate pairs were selected for analysis. Collectively these collocate pairs appear 9,886 times within OiBP and each individual concordance line underwent a qualitative analysis.

Legitimation theory in linguistics (Van Leeuwen and Wodak 1999) argues that the elevated position of power quoted social actors have within society legitimises and implicitly invites the reader to adopt the perspective they represent. Within OiBP, the power and influence these social actors have is further enhanced by the semantically powerful nouns and adjectives which frequently co-occur with them, for example, *leading*, *senior*, *director* and *Harvard*. An additional factor which legitimises the social actors is the fact that the reporting verbs following them are predominantly semantically neutral. The reporting verbs chosen by journalists to introduce the speech of a third party can express ambivalence and divergence. However, the reporting verbs found in this analysis indicate journalistic support towards the statements following them. Once the collocate pairs had been established, their concordance lines were qualitatively analysed to determine the topics being discussed by scientists and experts. The qualitative analysis focussed primarily on four research questions:

- (i) What are the topics and messages introduced by and discussed by the expert social actors frequently referenced in OiBP?
- (ii) To what extent do these topics and messages support or defy the negative and sensationalised representation of obesity found in chapter 4?
- (iii) Is there further evidence for the three proposed semantic macrostructures?
- (iv) To what extent does obesity receive a fair and accurate representation as a result of this linguistic pattern?

Table 5.6 in section 5.4 displays the different topics and the frequency with which each topic is discussed by the social actors under investigation. The table indicates that the SOCIAL ACTOR + REPORTING VERB collocate pairs and the topics they introduce provide further evidence for the semantic macrostructures which emerged in chapter 4. The two most predominant topics, *obesity can cause x* (33.4% n= 3,300) and *weight-normative approaches to health* (21.3% n= 2,105), in addition to *burden on public resources* (4.2% n= 411) were discussed in-depth.

The in-depth examination of these topics involved two primary analyses, a qualitative analysis of the concordance lines and surrounding co-text to establish the precise messages and ideologies being introduced, followed by a review of relevant scientific literature to determine if these messages and ideologies are representative. The results of this analysis reveal evidence of Reisigl and Wodak's (2001) intensification and mitigation strategy of representation. For example, within research contexts, obesity has been shown to correlate with diseases such as cancer, diabetes and heart disease (Kissebah et al. 1982, Charles et al. 1993, Sullivan 2010: 315). However, upon a rigorous analysis of the *obesity can cause x* intertextual messages in OiBP, it is evidenced that the factual correlative relationship is conflated into a relationship of causation which inaccurately places obesity in the primary culpable position for these diseases. In addition, a review of the existing literature revealed

there are multiple social determinants including socioeconomic status, race, age, stigma and weight cycling which are believed to significantly contribute to the diseases associated with obesity (Gilman and Knox 1998, Morris and Rimm 1992, Rosmand 2004, Klein et al. 2004). However, their role is backgrounded and ignored, and the role of obesity is sensationalised into the primary driver for disease. Furthering this, when expert sources discuss the NHS, obesity and individuals with obesity are assigned central blame and described as a *burden* on the NHS. It is argued that as obesity cannot be held solely responsible for its associated diseases, it also cannot be held responsible for the fragility of the NHS. The simplified yet sensationalised narrative is also present when expert sources discuss *weight-normative approaches to health*. Weight-normative approaches to health place emphasis on weight loss and weight management and within OiBP, authoritative and expert sources promote these approaches to health. However, weight-normative approaches to health have been proven to be largely ineffective and a common outcome of these methods is weight cycling (Brownell and Rodin 1994: 1325, Wing and Phelan 2005: 222). Weight cycling has been linked to an increase in stress hormone levels, blood pressure levels, blood fat levels and insulin sensitivity, variables which can contribute to diseases such as cancer, diabetes and heart disease (Rosmand 2004, Diaz, Mainous and Everett 2005, Thompson and McTiernan 2011, Sumithran and Proietto 2013, Tomiyama 2014, Hunger et al. 2015). These risks, which are parallel to the risks associated to obesity and are extensively intensified when obesity is under discussion, are mitigated and ignored when the discussion is focused on weight-normative approaches to health. This provided further evidence that the obesity media narrative is shaped into one of selective reporting and misinformation. It is argued that by only discussing one fraction of the issue, severe misrepresentation occurs and the dominant narrative, which is founded in factual information, is recontextualised and sensationalised in such a way that

scientific facts become distorted into fiction. This results in a negative representation for obesity, the foundations of which are built on inaccurate and misleading facts.

The primary results yielded from this analysis provide evidence that through the influential voices of experts and scientists in the media, obesity is persistently characterised as a threat to health and weight loss is characterised as an antidote. Such characterisations encourage readers towards a particular understanding of the issue. This is problematic because this particular understanding is developed from a simplified but sensationalised news media representation and is legitimised by the expert sources promoting it. At present obesity is inflated and vilified in the media and as a result, is scrutinised and stigmatised within society. Weight is one of the most stigmatised characteristics in society (Puhl and Brownell 2001: 788) and the physical and psychological effects of it can be detrimental (Tomiyaama 2014). Thornicrof et al. (2007: 192) describe stigma as ‘a problem of knowledge (ignorance), attitudes (prejudice) and behaviour (discrimination)’. Although the stigmatisation of weight is a systemic issue, not just confined to the media (see section 5.6), the media are the primary place in which the general public learn about health and characterisations developed by them can influence social ideologies and norms within society. Therefore, they have a responsibility to provide their readers with accurate representations and factual information as opposed to their current sensationalised and arguably fictional but newsworthy news reports.

6. Antithetical Identities in Personal Stories: The Rigid Dichotomy Between Fat and Thin

6.1 Chapter Introduction

As detailed in the literature review (section 2.7), personal stories in news discourse are a recurrent phenomenon and the reasoning behind their presence and their effect on public perceptions incites academic debate. For example, in the debate surrounding the representation of asylum seekers, Pantti and Ojala (2019: 1037) argue that ‘by telling the personal stories of asylum seekers, the journalists were increasing public understanding of the asylum seekers’ situations and their diverse backgrounds, thus bridging the emotional distance between ‘them’ and ‘us’’. Conversely, Birks (2017: 1346) argues that personal stories in tabloid anti-austerity campaign articles were not empowering and used members of the public to instrumentalise the newspapers’ wider political campaign goals (see section 2.7 of the literature review). Similarly, Kunelius and Renvall (2010: 515) argue that, ordinary people can be reduced to ‘symbol people’, whereby they are held up as a beacon of representation and in the process, marginalised because of journalistic story formats. An aspect of personal stories which elicits academic consensus is that they could be an opportunity to allocate agency and voice to social groups outside of the elite by identifying the gap ‘between the official rhetoric and experience’ (MacDonald, 2000: 261). As discussed in chapter 5, elite voices including *scientists* and *experts* within the weight and obesity domain appear within OiBP in abundance. The ideologies perpetuated by these sources and the way in which they are recontextualised in OiBP are reductive, unrepresentative of weight and unrepresentative of the scientific research surrounding weight. In addition, as argued throughout chapter 4, the linguistic choices by journalists, specifically the metaphorical constructions which pervade OiBP, are socially divisive, demonise and dehumanise people with obesity. Until this stage of the analysis, there has been no evidence of the social group

primarily under discussion - people with obesity - being given any agency. This final analysis chapter focuses on two key issues, self-representation and agency. The analysis explores if and how the individuals at the core of this issue are given agency and examines whether their agentive narrative propagates or challenges the prejudicial obesity media narrative evidenced so far.

In order to carry out this analysis, the presence of personal stories within OiBP needed to be established and then extracted to create a personal stories sub-corpus. This was achieved by carrying out a word sketch analysis on the lexical items, *obesity* and *weight*. The results of this analysis revealed patterns of the collocate pairs; *my + obesity*, *my + weight*, *his + obesity*, *his + weight*, *her + obesity* and *her + weight*. These collocate pairs were used to identify articles that featured personal stories (see section 3.1.2). Utilising this method, a total of 604 articles containing personal stories were identified and collated to create a personal story sub-corpus. The broadsheet and tabloid distribution of these articles can be found in Table 6.1.

Table 6.1: Distribution of Personal Stories across Broadsheet and Tabloid Newspapers

Frequency of Personal Stories: Broadsheet vs Tabloid			
Newspaper Style	Total Article Frequency	Frequency of Articles Containing Personal Stories	Relative Article Frequency per 100 Articles
Tabloid	8152	430	5.3
Broadsheet	8267	174	2.1

As demonstrated by the relative frequencies in Table 6.1, personal stories feature within the tabloid obesity media narrative over twice as often as the broadsheet obesity media narrative. Human interest stories are a featured aspect of tabloid journalism (Birks 2017: 1347). British tabloid journalism specifically presents the newspapers ‘as speaking for the common citizen and common sense’ (Hallin and Mancini 2004: 211). Therefore, it is an expected result to see more personal stories occurring in the tabloid newspapers featured within this corpus.

A further interesting imbalance within this sub-corpus of personal stories is the disproportionate number of stories about women. Within the personal stories, 543 different individuals are discussed and of those, 372 (68.5%) are women. Referring back to Table 1.1, the rates of men and women with obesity over the eleven years the data covers is the same, averaging at 24%. However, when comparing rates of men and women for the category of overweight and obesity, the figure for men is consistently higher by approximately 10%. Therefore, the gender split in the personal stories does not reflect the gender split in the UK when it comes to weight. This disproportionate split is discussed further in the proceeding sections.

6.2 Keyword Analysis

In an effort to establish the differences between OiBP and the personal stories sub-corpus created for this aspect of the investigation, a keyword analysis was carried out. The reference corpus utilised was OiBP minus the articles comprising the sub-corpus of personal stories. When examining the keyword list displayed in Table 6.2, there are lexical items which explicitly align with the semantic macrostructures discussed in chapters 4 and 5, (i) *obesity is rising rapidly*, (ii) *obesity is detrimental to health and the economy* and (iii) *urgent action and intervention is required*. For example, the semantic connotations of many of the lexical items on the list such as *weighed*, *dieting*, *heaviest* and *weighs* distinctly demonstrate that a pervasive theme within the personal stories is weight loss, thereby influencing the *urgent action and intervention is required* macrostructure. In addition, nouns such as *surgery* and *operation*, which have medical semantic implications appear to align with both the *urgent action and intervention is required* macrostructure and the *obesity is detrimental to health* macrostructure. These specific lexical items do not make this keyword list dissimilar to OiBP's keyword list (see Table 4.1). However, there are two distinct differences between the two keyword lists. The first is personal pronouns such as *I*, *her* and *she*.

Table 6.2: Personal Story Sub-Corpus Top 50 Keywords

Keyword	Frequency	Keyword	Frequency
#1 I	12,828	#26 balloon	162
#2 her	5,320	#27 she's	295
#3 she	5,691	#28 mother	456
#4 my	4,345	#29 weighs	225
#5 me	2,135	#30 tried	319
#6 stone	1,098	#31 wasn't	299
#7 I'd	675	#32 went	432
#8 gastric	809	#33 daughter	272
#9 size	1,200	#34 clothes	264
#10 surgery	1,248	#35 knew	257
#11 operation	562	#36 girl	275
#12 I'm	1,065	#37 procedure	196
#13 I've	683	#38 camp	183
#14 him	928	#39 herself	199
#15 mum	499	#40 comfort	162
#16 lost	830	#41 I'll	161
#17 band	526	#42 husband	184
#18 didn't	637	#43 dress	149
#19 myself	407	#44 fitted	129
#20 feel	805	#45 she'd	91
#21 felt	418	#46 son	208
#22 weighed	393	#47 surgeon	163
#23 couldn't	336	#48 heaviest	102
#24 bypass	291	#49 dieting	226
#25 started	472	#50 sister	117

In addition to not appearing on OiBP's top 50 keyword list (see Table 4.1), these personal pronouns do not even hold a position within OiBP's top 500 keywords. However, their presence is extensive on the personal stories sub-corpus keyword list with a total of twelve in the top 50. The sub-corpus is comprised of personal stories, making this result interesting but unsurprising. In addition, pronouns were an aspect of the linguistic criteria used to identify and extract these articles from the larger corpus (see section 3.1.2), therefore this is another reason their keyness in the sub-corpus is unsurprising. An interesting and less overt

difference between these two keyword lists is the presence of the verbs *feel* and *felt*, which are the 20th and 21st keywords in this sub-corpus. It has been discussed and evidenced in this research that obesity as a phenomenon has been dehumanised in British newspapers. However, these verbs introduce emotions and are inherently humanising. Taking this into account, it was decided that emotive expression would be an interesting line of inquiry. Therefore, the verbs *feel* and *felt*, their collocations, concordance lines and co-text were further analysed to explore four primary research questions:

- (i) How are the feelings of the individuals under discussion conceptualised?
- (ii) To what extent is weight gain and/or weight loss a contributing factor to the expressed feelings?
- (iii) Are the same semantic macrostructures present in general reporting also found in personal stories?
- (iv) To what extent do the personal narratives contest or support the disparaging representation of weight found in prior chapters?

6.3 *Feel and Felt*

The first stage of analysis involved an exploration into the prevalent collocates of *feel* and *felt*. The collocation span used was L0, R1 and R2 and frequency was used as the collocation measure. As *feel* and *felt* are verbs which express emotion and capturing how individuals feel and felt is a primary aim, it was their immediate right adjective collocates that were of particular interest. R1 and R2 as opposed to just R1 was chosen to account for adverbs, for example, 'I felt *extremely* sad'. As displayed in Tables 6.3 and 6.4, a wide variety of adjectives are used within the personal stories to describe emotional states. The adjectives have been divided into positive, negative and neutral categories based on their semantic implications and based on a line by line analysis of each collocate pair to determine how they are used in context. For example, the adjective *embarrassed* has negative semantic

connotations but upon closer analysis, in four out of the seven times it is used to describe an emotional state, a negation such as *don't* or *do not* occurs before it, see extract 1.

Extract 1: Daily Mail, 14th June 2006.

When we walked down the street, strangers pointed: “Look at that fat kid.” But
I didn't feel embarrassed, in fact we enjoyed the attention.

In this example, the negation overrides the negative semantic implication *embarrassed* has and it used in a positive manner. Therefore, negation was taken into consideration when placing adjectives into the positive and negative columns in Tables 6.3 and 6.4 and because of this, some adjectives, like *embarrassed* appear in more than one column.

Table 6.3: R1 and R2 Adjectives of *Feel*

All R1 and R2 Adjective Collocates of 'feel' (n= 363)		
Positive	Negative	Neutral
<i>better</i> (n= 42)	<i>guilty</i> (n= 22)	<i>full</i> (n= 49)
<i>good</i> (n= 22)	<i>bad</i> (n= 13)	<i>hungry</i> (n= 26)
<i>confident</i> (n= 15)	<i>sick</i> (n= 12)	<i>fuller</i> (n= 15)
<i>great</i> (n= 11)	<i>tired</i> (n= 7)	<i>fine</i> (n= 3)
<i>happy</i> (n= 10)	<i>sad</i> (n= 6)	<i>different</i> (n= 2)
<i>comfortable</i> (n= 9)	<i>ashamed</i> (n= 6)	
<i>healthy</i> (n= 9)	<i>terrible</i> (n= 6)	
<i>amazing</i> (n= 6)	<i>worse</i> (n= 5)	
<i>fitter</i> (n= 5)	<i>angry</i> (n= 4)	
<i>embarrassed</i> (n= 4)	<i>deprived</i> (n= 4)	
<i>beautiful</i> (n= 3)	<i>awful</i> (n= 3)	
<i>fantastic</i> (n= 3)	<i>embarrassed</i> (n= 3)	
<i>sexy</i> (n= 3)	<i>stressed</i> (n= 3)	
<i>unhealthy</i> (n= 3)	<i>uncomfortable</i> (n= 3)	
<i>brilliant</i> (n= 2)	<i>wretched</i> (n= 3)	
<i>energetic</i> (n= 2)	<i>anxious</i> (n= 2)	
<i>happier</i> (n= 2)	<i>confident</i> (n= 2)	
	<i>dreadful</i> (n= 2)	
	<i>fat</i> (n= 2)	
	<i>foolish</i> (n= 2)	
	<i>hopeless</i> (n= 2)	
	<i>nervous</i> (n= 2)	
	<i>unwell</i> (n= 2)	
	<i>great</i> (n= 1)	

Table 6.4: R1 and R2 Adjectives of *Felt*

All R1 and R2 Adjective Collocates of 'felt' (n= 132)		
Positive	Negative	Neutral
<i>fantastic</i> (n= 8)	<i>ashamed</i> (n= 8)	<i>full</i> (n= 19)
<i>great</i> (n= 6)	<i>guilty</i> (n= 5)	<i>fine</i> (n= 3)
<i>amazing</i> (n= 6)	<i>awful</i> (n= 4)	<i>hungry</i> (n= 2)
<i>better</i> (n= 3)	<i>uncomfortable</i> (n= 4)	
<i>confident</i> (n= 3)	<i>down</i> (n= 4)	
<i>good</i> (n= 3)	<i>sick</i> (n= 4)	
<i>happy</i> (n= 3)	<i>embarrassed</i> (n= 4)	
<i>healthier</i> (n= 3)	<i>tired</i> (n= 4)	
<i>proud</i> (n= 3)	<i>miserable</i> (n= 3)	
<i>unhappy</i> (n= 3)	<i>sad</i> (n= 3)	
<i>satisfied</i> (n= 2)	<i>angry</i> (n= 2)	
<i>brilliant</i> (n= 2)	<i>bad</i> (n= 2)	
	<i>bloated</i> (n= 2)	
	<i>depressed</i> (n= 2)	
	<i>dreadful</i> (n= 2)	
	<i>helpless</i> (n= 2)	
	<i>suicidal</i> (n= 2)	
	<i>terrible</i> (n= 2)	
	<i>unable</i> (n= 2)	
	<i>unattractive</i> (n= 2)	

The results displayed in Tables 6.3 and 6.4 demonstrate a rigid contrast of positive and negative emotions felt by the individuals featured in these articles. Taking this, the keyword list and the themes of weight loss indicated by the keyword list into consideration, a hypothesis can be made that the personal stories contain narratives of weight loss endeavours which detail the emotions felt by the individuals featured throughout. To explore this further and to understand how the individuals in the stories represent themselves and conceptualise their feelings in relation to their weight and potentially their weight loss, the concordance lines and the sentences surrounding all of the *feel* + ADJECTIVE and *felt* + ADJECTIVE collocate pairs were qualitatively analysed.

6.3.1 *Feel + Better*

The qualitative analysis began with the verb *feel* and its most frequent positive adjective collocate, *better*. This collocate pair occurs 42 times and upon analysis, and with the exception of two concordance lines which discuss body acceptance, clear antithetical pre- and post-weight loss identities began to emerge (extracts 2-5).

Extract 2: The Guardian, 12th August 2016.

I have just started exercising regularly in the last five weeks and I **feel better** so now I don't want to comfort eat my way through a tonne of chocolate.

Extract 3: Daily Mail, 18th September 2007.

Not only does everyone tell me I look better, I **feel far better** due to my improved diet, and my sleeping has improved.

Extract 4: Daily Mail, 1st October 2010.

I slimmed down and finally started to **feel better** about myself.

Extract 5: The Sun, 12th July 2015.

I have lost about three stone in a year and I **feel better** for it.

Better is a comparative adjective. An analysis of the *feel + better* collocate pairs in context demonstrates that the comparisons being made within the personal narratives are behaviours and emotions before weight loss and behaviours and emotions after weight loss. The pre-weight loss identity conceptualised with this collocate pair is consistently shaped as an individual with low self-esteem, who is unattractive, unhappy and engaging in what is deemed as deviant behaviours such as comfort eating. For example, in extracts 3, 4 and 5 the individuals describe *looking better* and *feeling better* as a result of weight loss. In addition to weight, specific behaviours such as comfort eating are juxtaposed with behaviours such as dieting and exercising (see extracts 2 and 3). As the *feel + better* collocate pair is situated in between these behaviours, it can be argued that its comparative semantic connotations

generate good behaviour versus bad behaviour associations, thereby further polarising the two separate identities materialising in these narratives and attaching an element of morality to them. Therefore, bad behaviours, in addition to unhappiness and unattractiveness also become associated with the fat identity being shaped in these personal narratives and in contrast, good behaviours become associated with the thin identity. Although there is not an explicit negative reference to their previous weight in these examples, the definition of *better*, as ‘comparatively more desirable or favourable’ (Merriam-Webster Online Dictionary 2019d), creates a semantic implication that instantaneously attaches a negative representation to the comparative element in the statement, which in these examples is the individuals’ weight. In pragmatic theory, *better* is described as a ‘presupposition trigger’ (Levinson 1983: 183). ‘Presuppositions are defined as unspoken propositions or pragmatic inferences whose truth is taken for granted in the utterance of a sentence’ (Huang 2011: 398). They represent ‘implicit claims inherent in the explicit meaning of a text or a statement’ (Richardson 2007: 63). Therefore, ideologies which, without being openly stated or asserted, are automatically driven by the formulation of the utterance and are irrefutably credited as being veritable (Yule 1996: 25). Presuppositions are triggered by specific lexical items and linguistic constructions, referred to as *presupposition triggers* (Levinson 1983: 179). Levinson (1983: 181-83) lists 31 different categories of presupposition triggers, some of which include factive verbs such as *know*, *regret* and *aware*, temporal constructions such as *before*, *after*, *now*, change of state verbs such as *stop*, *begin* and *start* and comparisons such as *better* and *too*. It is argued that it is these specific lexical items which can trigger the communication of tacit ideologies (Levinson 1983: 183). For example, referring back to extract 2:

Extract 2: The Guardian, 12th August 2016.

I have just started exercising regularly in the last five weeks and I **feel better** so **now** I don't want to comfort eat my way through a tonne of chocolate.

This statement has two examples of the presupposition triggers established by Levinson (1983), *better* and *now*. In this example, *better* is being utilised as an emotional comparative as it is preceded by the verb *feel*. Therefore, the presupposed message triggered by *better* is that the individual had negative feelings in the past. As this statement is discussing weight loss and weight loss practices, the tacit information assumed to be true and the implied message resulting from this presupposition is that prior to exercising regularly and losing weight, this individual felt negatively about themselves. In addition, the use of the adverb *now* before a statement about an aversion towards comfort eating, presupposes that this individual used to engage in eating chocolate as an emotional response to their body dissatisfaction. This presupposition further supports the unhappy, deviant characteristics of the fat identity and the happier, virtuous characteristics of the thin identity. In addition, as *now* is a temporal adverb, it further perpetuates the before and after aspects of the antithetical identities emerging in these stories. These presuppositions triggered by the lexical items *now* and *better* create implications about body weight and behaviours such as comfort eating that contribute towards stereotypical and often inaccurate stereotypes about weight and individuals with obesity. The fact that these presuppositions and their implications are present and abundant in these stories is important because presuppositions are centred around the concept of truths:

‘Through presupposition speakers/authors can consciously and subconsciously manipulate the audience by presenting certain beliefs as true, given and unquestionable, even if they were not known or shared by the audience before.’

(Polyzou 2015: 124).

The basic presupposition logic is that ‘A presupposes B if B is a precondition of the truth or falsity of A’ (Strawson 1952: 175). Using extract 2 as an example again, in order for it to be true that the individual feels *better* about losing weight and exercising, it has to be true that

they felt *worse* prior to the weight loss and exercising. The previous *worse* feelings are the resulting implication from the individual's statement, but they are also a precondition of truth for the present *better* feelings. The same logic can be applied to *now*. In order for the individual to not engage in comfort eating behaviours *now*, they had to have engaged in comfort eating behaviours *before*. Again, the prior comfort eating behaviours are the resulting implication from this statement and they are also the precondition of truth for the individual's avoidance of these behaviours *now*. *Before* and *worse* represent the fat identity, *better* and *now* represent the thin identity. These identities are perpetuated through the presuppositions and implications generated through the individual's statement. It can be argued that the implications which result from presuppositions are compelling due to the adjacency of inherent truth and implicit irrefutability in the statements. Therefore, in addition to simply enforcing the fat/thin antithetical identities and their stereotypical characteristics through the *feel + better* collocate pair, these identities and their characteristics are strengthened by the presuppositions triggered by the collocate pair and the surrounding language.

As the adjective *better* is a presupposition trigger, the effect that presuppositions have on the ideological underpinnings of a statement applies to all of the 42 *feel + better* statements in these personal stories. As mentioned earlier, 40 of the *feel + better* collocate pairs are used in reference to weight loss efforts. Therefore, the antithetical identities and their respective characteristics outlined above are enforced in each of these instances. Referring back to Tables 6.3 and 6.4, *feel + better* is just one of the many collocate pairs investigated in this analysis. However, *better* is the only adjective collocate which is also a presupposition trigger. In extract 2, it is evidenced that presupposition triggers can also occur in the immediate co-text of the *feel + ADJECTIVE* and the *felt + ADJECTIVE* collocate pairs. When progressing with the remainder of the analysis it became clear that *better* is not the only adjective which collocates with presupposition triggers. Therefore, the analysis moving

forward focuses on how the emotions of the individuals are conceptualised, how presupposition triggers influence these conceptualisations and how this affects individuals' overall self-representation.

6.3.2 *Feel/Felt* + POSITIVE ADJECTIVES

The results of the *feel* + *better* analysis indicated towards the shaping of two separate antithetical identities, a thin, happy, desirable, attractive and admirable identity and a fat, unhappy, unattractive, undesirable and deviant identity. Upon analysing the remaining collocate pairs, their concordance lines and their surrounding co-text and sentences, these antithetical identities became clearer and more salient. Beginning with the positive adjective collocate pairs which primarily represent the thin identity, the individuals in these stories utilised them to reference a small variety of topics which can be found in Table 6.5. These topics were identified throughout and as a result of the analysis and they represent what the individuals *feel* and *felt* positive about. For example, in extract 6 the individual describes feeling *good* subsequent to weight loss, therefore, it was characterised under the 'post weight loss' category which can be seen in the table. Referring back to section 6.1, the majority of these personal stories (68.5%) are about women even though an equal amount of men and women have obesity, and 10% more men are overweight (Table 1.1). In addition, as Table 6.5 highlights, weight loss is the primary topic under discussion through the use of the *feel/felt* + POSITIVE ADJECTIVES linguistic pattern. Therefore, while the personal stories do not reflect the gender split in terms of weight in the UK, they do appear to concur with the pervasive social ideologies which project weight loss as primarily a women's issue and place more emphasis on thinness as an equivalent to beauty (Blaine and McElroy 2002).

Table 6.5: *Feel/Felt* + POSITIVE ADJECTIVE Topics

	<i>Feel</i> + POSITIVE ADJECTIVE Topics (n= 151)	<i>Felt</i> + POSITIVE ADJECTIVE Topics (n= 42)
Post-Weight Loss	132 (87.4%)	39 (92.9%)
Body Positivity	7 (4.6%)	
Dieting	6 (4%)	3 (7.1%)
Being Referred to as 'thin'	3 (2%)	
Exercising	3 (2%)	

Extract 6: Daily Mail, 20th November 2007

I've **since** lost more than 4st and for the first time I **feel good** about my body

Extract 7: Daily Mirror, 9th June 2016.

“**After** losing that weight I **felt fantastic**”

Extract 8: The Sun, 14th September 2006.

I cycle and swim several times a week and I **feel fitter now**

Extract 9: Daily Mail 22nd February 2007.

I held up my head **again** and **felt proud** facing the world [...] Weight weighs you down in so many more ways than just gravity.

Extract 10: The Sun, 29th January 2014.

I **feel confident** in my body – and although I have done faddy diets in the past, **now** I just want to be happy and healthy, but not thin. I honestly believe that you can be curvy and healthy

As Table 6.5 and extracts 6-10 demonstrate, adjectives with positive semantic connotations are largely utilised to conceptualise a happier, healthier and thinner persona. Due to the abundance and variety of positive adjectives used to shape this persona, it can be argued that this leads to a romanticised representation of weight loss. This is because the happy, healthy and thin persona is a societal archetype which can simplify and misrepresent weight. In

addition to positive adjectives, presupposition triggers can also be found in these extracts. *Since, after, again* and *now* are all change of state and temporal constructions (Levinson 1983: 181-83). The individuals report *feeling fantastic* and *good, after* and *since* losing weight and *feeling fitter, proud* and *confident, again* and *now* as a result of weight loss or behaviours associated with weight loss such as exercising. Therefore, the combination of these presupposition triggers and the positive adjectives enhance the before and after comparisons within these statements. Higher weight is demonised, and through this particular linguistic pattern, it is profoundly associated with sadness and a multitude of other negative emotions. In addition, this archetype drives harmful stereotypes which marginalise the individuals that exist outside of the idealised standard by branding them as lazy, unattractive and deviant. Extracts 6-9 are examples of this. They describe feeling *fantastic, fitter, proud* and *good* as a result of weight loss, portraying weight loss and thinness as admirable ideals. As detailed by Table 6.5 this topic is the most pervasive accounting for 87.4% of the *feel* + POSITIVE ADJECTIVE collocate pairs and 92.9% of the *felt* + POSITIVE ADJECTIVE collocate pairs. The theme of weight loss and the idealisation of thinness feeds into the wider narrative and semantic macrostructures present in OiBP (see chapters 4 and 5) such as *urgent action and intervention is required*, and *obesity is detrimental to health and the economy*. Therefore, overall, the wider semantic macrostructures in the personal stories are similar to the macrostructures found in general reports about obesity. However, the strategies used to execute these macrostructures are very different. In the previous chapters, weight and people with obesity have been conceptualised as problematic under the veil of metaphors and implicitly through discussions surrounding health and the economy. In the articles in the personal stories sub-corpus, weight is conceptualised as problematic in an overt emotional and personalised manner. In the extracts above, positive adjectives are used, but the implicit ideologies behind them are negative, as evidenced by the temporal and change of state

presupposition triggers. Extract 9 for example, demonstrates the shame attached to weight, extracts 6 and 7 demonstrate the internalised contempt individuals have towards their weight when it is higher than what is deemed socially acceptable. Shame and contempt towards weight are distinct indications of weight bias. In these extracts, the individuals are compliant with these biases and challenge themselves and their weight as opposed to challenging arbitrary societal standards and weight bias. Therefore, their representation of themselves contributes towards the stigmatising narrative pervading OiBP (see section 6.4 for further discussion). As seen in the previous chapter (see section 5.4.2) obesity is portrayed as a deadly phenomenon for which weight loss is the antidote. It is evident that in addition to this, in these stories weight loss is also portrayed as the antidote to weight bias. The individuals report that the shame and contempt they feel towards their bodies and towards themselves is alleviated as a result of weight loss. They feel *proud*, *fantastic* and *good*. However, the argument can be made that it is not the weight loss but societal acceptance which has induced these emotions. As Table 6.5 demonstrates, this notion and the notion of body positivity is scarcely explored in the personal narratives. Extract 10 is an example of an individual who appears to be rejecting the archetype which permeates throughout these stories, specifically by discussing healthiness and happiness as being the antithesis of thinness. However, the extract in its entirety reads as follows:

My blood pressure is fine, I don't have health problems and I try my best to eat healthily and get my five a day. I go to regular spin classes and do eight mile walks every weekend, but my weight and height still work out above average. I think of the hugely overweight people you often see in America or the large people that are putting a strain on the NHS – and I don't like to be lumped into the same category as them. I **feel confident** in my body – and although I have done faddy diets in the past, now I just want to be happy and healthy, but not

thin. I honestly believe that you can be curvy and healthy. Although maybe I could lose a little weight, I'm happy with the way I am.

It is clear from this extract that although this individual claims to have accepted her weight, she still has internalised fatphobic ideologies. This is evident through the over-justification of her weight in the beginning of the extract and then by her efforts to separate herself from other people with obesity, a strategy also reported in personal news stories about individuals claiming benefits (see section 2.7). Her over-justification efforts include listing behaviours such as exercising, behaviours which, as discussed in section 6.3.1, correlate to the thin and socially acceptable identity. This can be interpreted as an effort to be accepted in a society which inherently rejects individuals on the basis of their weight. She describes other people with obesity as 'a strain on the NHS' and utilises the othering pronoun 'them'. Although technically the collocate pair *feel* + *confident* is being used to describe body liberation, it is clear from the surrounding sentences that the individual still subscribes to the dominant societal ideologies which demonise weight and idealise thinness. This pattern is found in four out of the seven *feel* + POSITIVE ADJECTIVE collocate pairs which broach the topic of body liberation and body positivity. Therefore, the instances in which the individuals sharing their story offer counter arguments to the dominant narratives and macrostructures found in OiBP are rare.

In addition, it is clear from these examples that parallel to the *feel* + *better* collocate pair, presupposition triggers frequently occur in adjacency with the other collocate pairs under examination. The *feel/felt* + POSITIVE ADJECTIVE collocate pairs occur a total of 193 times and an analysis of their concordance lines and surrounding co-text found 90 presupposition triggers in their immediate co-text. Therefore, presupposition triggers are a notable pattern. The presupposition triggers found in the remainder of the *feel/felt* + POSITIVE ADJECTIVE concordance lines mimic the effect of the presupposition triggers found with the *feel* + *better*

collocate pair (see section 6.3.1 for full discussion). As discussed, the presupposition triggers in extracts 6-9, *since*, *again*, *after* and *now* are all temporal and change of state constructions which enhance the before and after comparisons embedded in these statements. In addition, as the subject under discussion in these extracts is weight loss and behaviours associated with weight loss such as an increase in exercise, the antithetical identities emerging in the personal stories are further fortified. As previously argued, these antithetical identities represent reductive and oppressive societal archetypes regarding weight. As most of these stories are about women (68.5%), reductive and oppressive social ideologies about women which dictate that women need to be thin to beautiful, are also projected through this linguistic pattern. Extracts 11-13 are additional examples of the presupposition triggers found in the concordance analysis.

Extract 11: The Sun, 23rd April 2012

I'm so happy with how I look **now**. **Before** I hid away in baggy clothes but **now**, I feel **confident** in dresses and skirts that show off my new shape.

There are numerous temporal presupposition triggers in this example. In the first sentence, the notion that that the individual had previously felt negatively about their appearance is not explicitly stated but is presupposed by the presupposition trigger *now*. This notion is immediately reinforced with the second temporal presupposition trigger, *before*. *Before* presupposes that hiding away in baggy clothes was a past behaviour of the individual, the inference being that this behaviour coincided with their previous negative body image. The subsequent presupposition triggered by *now* is that the individual wears more fitted clothing as a result of *feeling confident* after weight loss. The juxtaposition of these presuppositions implies that, according to this person, larger bodies are unattractive and need to be hidden, whereas smaller bodies can be shown. These presuppositions and implications contribute towards the antithetical identities discussed previously because they promote the ideologies

that larger bodies create low self-esteem and the best method with which to overcome it is through weight loss. In addition, these presuppositions and the inferences created from them perpetuate beauty standard norms which denigrate fat bodies and label them as unattractive and shameful.

Extract 12: The Sun, 18th April 2011

We **know** we typically need to lose 3st 9lb to **feel good**. This large amount of weight makes us feel desperate, afraid and overwhelmed.

Similarly, the presuppositions and the resulting inferences in extract 12, also perpetuate antithetical identities and stereotypical, negative ideals about weight. *Know* is a factive verb (Levinson 1983: 181) and in this example, triggers the presupposition that negative feelings will incur as a result of a failure to ‘lose 3st 9lbs’. The semantic connotations of *know* include conviction and certainty and therefore enhance the credibility of the presupposition. This presupposition implies and supports the pervasive notion that fatness is synonymous with unhappiness. This notion and the antithetical identities are further enhanced by the adjectival antithesis present in this extract. The contrast of the positive adjective *good* with the negative adjectives *desperate*, *afraid* and *overwhelmed* further support and enforce the positive thin identity and the negative fat identity.

Extract 13: Daily Mail, 22nd February 2007

I understand how devastating it is to be seriously overweight, and how liberating it is to shed the problem and **feel healthy again**

In the previous examples, the presuppositions enforce ideologies about weight and appearance. Extract 13 is an example of the presuppositions in the personal stories which correlate weight to health. *Again*, when used in this context, presupposes that feeling *healthy* is predicated on weight and weight loss and that higher weight and good health are antonymous phenomena. This concept, as discussed in chapter 5, is a simplified

misrepresentation of weight and health. In addition, in the same way as extract 12, the adjectival antithesis of *devastating* and *liberating* reinforces the antithetical identities within these narratives.

As discussed at the beginning of this section, the *feel/felt* + POSITIVE ADJECTIVE collocates occur 193 times and co-occur with 90 presupposition triggers. With the exception of three instances in which the *feel/felt* collocate pairs are used to discuss body positivity and body liberation (see section 6.5), extracts 6-13 and the discussions surrounding them are representative of all the examples found in the personal stories. The *feel/felt* + POSITIVE ADJECTIVE collocate pairs are utilised to describe and represent a happy and healthy post-weight loss, thin identity and an individual who engages in *good* behaviours associated with thinness such as dieting and exercising (see Table 6.5). The thin identity is the primary identity overtly discussed using this particular linguistic pattern. However, through the use of temporal, factive and comparative presupposition triggers, which frequently co-occur with the positive adjective linguistic pattern, a contrasting pre-weight loss fat identity, which is antithetical to the thin identity is reinforced. Using presupposition triggers in this particular context initiates the implication of an opposing identity without an explicit reference to it. Interestingly, when the same analysis was carried out on the *feel/felt* + NEGATIVE ADJECTIVE concordance lines, different results were found.

6.3.3 *Feel/Felt* + NEGATIVE ADJECTIVES

When comparing the results of the *feel/felt* + NEGATIVE ADJECTIVE analysis to the *feel/felt* + POSITIVE ADJECTIVE analysis, there are parallels and there are contrasts. The parallels which can be drawn are the distinct antithetical thin and fat identities. These collocate pairs, as demonstrated by Table 6.6, are primarily utilised to discuss emotional states before a weight loss endeavour, and to condemn themselves for engaging in behaviours deemed negative such as bingeing. For example, individuals describe feeling *ashamed* and *dreadful* about their

appearance, *guilty* for using NHS services and feeling *down*, *depressed* and *terrible* after engaging in negatively deemed behaviours (see extracts 14-19).

Table 6.6: *Feel/Felt* + NEGATIVE ADJECTIVE Topics

	<i>Feel</i> + NEGATIVE ADJECTIVE Topics (n= 117)	<i>Felt</i> + NEGATIVE ADJECTIVE Topics (n= 66)
Pre-Weight Loss	56 (47.9%)	46 (69.7%)
Bingeing	18 (15.4%)	4 (6.1%)
Parental Guilt	14 (12%)	7 (10.6%)
Being Stigmatised	9 (7.7%)	
Using NHS Services	8 (6.8%)	
Extreme Diets	8 (6.8%)	1 (1.5%)
'Cheating' on a Diet	3 (2.6%)	6 (9.1%)
Going to Work		2 (3%)
Beauty Standards	1 (0.8%)	

Weight loss is the most prevalent topic (88.6%) the *feel/felt* + POSITIVE ADJECTIVE collocate pairs are used in reference to. Weight loss is also the most prevalent topic the *feel/felt* + NEGATIVE ADJECTIVE collocate pairs are used in reference to, but the overall *feel* + NEGATIVE ADJECTIVE and *felt* + NEGATIVE ADJECTIVE percentage is notably less at 55.7%. In addition to conceptualising a past, pre-weight loss, negative fat identity, the *feel/felt* + NEGATIVE ADJECTIVE collocate pairs conceptualise a present, negative fat identity. This indicates that the personal stories also include stories about individuals who have obesity and are discussing their negative feelings towards it as well as stories about weight loss.

Extract 14: The Sun, 21st February 2011

At night I eat a main meal, then more biscuits, crisps and chocolates as I get bored. Afterwards, I **feel terrible** as I know I'm letting myself down.

Extract 15: Daily Express, 17th February 2012

I **feel guilty** that there are cancer patients being denied the treatment they desperately need because the NHS won't pay, when obese people like me are costing the NHS millions.

Extract 16: Daily Mail, 15th October 2006.

I used to **feel ashamed** when shopping in regular-size clothes shops.

Extract 17: Daily Mail, 13th May 2008.

I weighed 21 and a half stone and I looked and **felt dreadful**.

Extract 18: The Sun, 17th August 2010

She said: I was stuck in a vicious cycle of comfort eating, and I turned to sweets and chocolate when I **felt down** or **depressed**.

Extract 19: Daily Mirror, 3rd February 2010

Sue, 35, tells us: 'I **feel guilty** for not saying no enough [...] He's constantly hungry and it was easy to give him a packet of crisps or a bar of chocolate

There are two ways in which the use of *feel/felt* + NEGATIVE ADJECTIVE collocate pairs differs to the use *feel/felt* + POSITIVE ADJECTIVE collocate pairs. The first is the specificity and the range of topics the collocate pairs are utilised in reference to. In addition to detailing general feelings about their weight and discussing dieting and exercising, negative adjective collocate pairs are utilised to discuss a wider range of *deviant* behaviours. Parental guilt, using NHS services and bingeing are highlighted and comparatively discussed in more detail when negative adjectives collocate with *feel* and *felt*. It can be argued that the greater depth to which these issues are discussed further reinforces the adverse attributes of the fat identity created in these stories. Referring back to section 6.3.2, when the *feel/felt* + POSITIVE ADJECTIVE collocate pairs are used, temporal and comparative presupposition triggers are utilised to generate a subtle before and after fat versus thin identity comparison. The

character traits attributed to the fat identity through this particular linguistic pattern are primarily unhappiness, unattractiveness and deviance. When the *feel/felt* + NEGATIVE ADJECTIVE collocate pairs are used, the characteristics of this identity are expanded to also include, a burden on NHS services (see extract 15), bad parenting skills (see extract 19) and greed (see extracts 14 and 18). Furthering this, an interesting aspect of dissimilarity between the positive adjective and negative adjective collocate pair patterns is the distinct absence of presupposition triggers appearing with negative adjectives. As discussed in section 6.3.2, there are 193 *feel/felt* + POSITIVE ADJECTIVE collocate pairs with 90 co-occurring presupposition triggers. The same analysis was carried out with the *feel/felt* + NEGATIVE ADJECTIVE collocate pairs (n= 183) and found only 18 co-occurring presupposition triggers. In these stories, *feel/felt* + POSITIVE ADJECTIVES are utilised to conceptualise the more positive identity and the specific presupposition triggers utilised in conjunction with them (see section 6.3.1 and 6.3.2), are used to reinforce a contrastive negative identity. *Feel/felt* + NEGATIVE ADJECTIVES are used to conceptualise the negative identity, which in these articles is a fat identity. However, when the fat identity is the primary identity under discussion, presupposition triggers are rarely utilised to draw a direct comparison and reinforce the thin contrastive identity. The pattern of identity comparison in these stories is interesting. As indicated by the keyword list (see section 6.2), a primary theme within these stories is weight loss. Therefore, there is a macro-level identity comparison throughout these stories. However, from a micro-linguistic perspective, it appears that a greater effort is made to highlight and reinforce negative ideologies surrounding weight by outweighing many of the positive perspectives with a negative perspective. This is evident from the presupposition analysis. The pattern of positive narratives being countered with a negative narrative is prevalent, but it is not reciprocal. Presupposition triggers are present with *feel/felt* + NEGATIVE ADJECTIVES collocate pairs but co-occur with them comparatively less frequently to *feel/felt* + POSITIVE

ADJECTIVE collocate pairs. Therefore, it appears that balancing a negative narrative with a positive narrative is less important to the writers and curators of these stories. An additional factor which could explain the lack of co-occurring presupposition triggers with negative adjectives is the fact that the negative adjective collocate pairs are also used to conceptualise a present, unhappy fat identity. Many of the presupposition triggers seen earlier include temporal constructions such as *before*, *after*, *now*, change of state verbs such as *stop*, *begin* and *start* and comparisons such as *better* and *too*. It can be argued that when discussing a present fat identity, the negative associations have already been enforced, making comparisons and temporal constructions less necessary.

It is clear from the extracts that in the personal stories, that the *feel/felt* + NEGATIVE ADJECTIVE collocate pairs are being used to describe a negative fat identity, an identity who is unhappy, ashamed, guilty and deviant. The character traits attributed to this identity mimic the pervasive societal stereotypes about weight. In the previous chapter which focused on quotes and opinions from scientists and experts, it was argued that their arguments and ideologies about weight and health are influential because of their knowledge and their position in the social hierarchy. A similar argument can be made in this aspect of the analysis. It is the individuals central to the issue under discussion who are perpetuating these identities and ideologies in these stories. Therefore, similar to the last chapter, their social position authenticates their arguments and increases the likelihood that audiences will accept their depiction. Their depiction, which has been demonstrated by the analysis, is clear antithetical thin and fat identities, each of which possessing stereotypical characteristics. The thin identity is portrayed as happy, attractive and healthy and the fat identity is portrayed as sad, unattractive and unhealthy (see section 6.4). In terms of the linguistic strategies of representation, Reisigl and Wodak's (2001: 46) five-pronged representation framework has been repeatedly referenced (see chapters 3, 4 and 5). The evidence accrued from the analysis

of personal stories demonstrates clear predication strategies. Predication strategies can be 'realised as stereotypical, evaluative attributions of negative and positive traits in the linguistic form of implicit or explicit predicates' (Reisigl and Wodak 2001: 45). As predication is a process of linguistically assigning qualities to social groups and individuals, adjectives are one of the key ways in which this strategy is linguistically realised (Reisigl and Wodak 2001: 55). The adjectives found in these stories, conceptualise two antithetical identities. One of which possesses traits which include happiness, confidence, attractiveness and thinness and the opposing identity possesses traits which include unhappiness, low self-esteem, unattractiveness and fatness. In addition to evaluative attributes, stereotypes are also perpetuated by the *feel/felt* + POSITIVE/NEGATIVE ADJECTIVE collocate pairs. The dominant societal stereotypes about obesity and individuals with obesity include laziness, lack of will power, a lack of moral character, poor personal hygiene, a low level of intelligence and unattractiveness (Puhl and Brownell 2001: 800). Many of these stereotypes are introduced, reproduced and due to the extent in which they appear, they are arguably naturalised by the prevalent predicate adjectives utilised to conceptualise the individuals in these stories. In addition, as most of the stories are about women, oppressive societal beauty ideals are also introduced, reproduced and naturalised in these stories. Reisigl and Wodak (2001: 57-58) argue through the linguistic construction of social groups, a level of de-individualisation and homogeneity can be created. An interesting aspect about this particular element of analysis is that the articles under examination are stories of individuals. Therefore, de-individualisation should be ostensibly reduced. However, the way in which each individual presents themselves and the way in which they are each presented to the audience by the journalists is so homogenous that individualisation dwindles, and through predication, stereotypical generalisations prevail.

While analysing the concordance lines of the *feel/felt* + NEGATIVE ADJECTIVE collocate pairs, an interesting linguistic pattern emerged. As detailed by Table 6.7, adjectives which also have negative semantic connotations frequently co-occur with *feel/felt* + NEGATIVE ADJECTIVE collocate pairs. For example,

Extract 20: The Sun 18th April 2011

We **feel hopeless, defeated, ashamed and embarrassed**, and food is one of our few pleasures left in life.

Using negative adjectives in succession like this reinforces the identity shaped by the collocate pairs. The evidence discussed so far has indicated that the writers of these stories favour negative portrayals of weight, frequently counterbalancing positive narratives and identities with negative narratives and identities. Table 6.7 demonstrates that in addition to utilising *feel/felt* + NEGATIVE ADJECTIVE collocate pairs to shape a flawed and inferior identity, similar adjectives which also carry negative semantic connotations are frequently utilised in co-occurrence with them to reinforce these identities. Therefore, there is a pattern of negative reinforcement with positive and negative narratives. The co-occurrence of additional, successive positive adjectives is notably and comparatively less frequent with *feel/felt* + POSITIVE ADJECTIVE collocate pairs. Presupposition trigger patterns have also been included in Table 6.7 to display and compare the co-occurrence patterns of all the *feel/felt* + ADJECTIVE collocate pairs analysed.

Table 6.7: Adjective Co-Occurrence Patterns

	<i>Feel/Felt</i> + POSITIVE ADJECTIVES (n= 193)	<i>Feel/Felt</i> + NEGATIVE ADJECTIVES (n= 183)
Presupposition triggers	90	18
Positive/Negative Adjectives	15	51

A total of 51 out of the 183 *feel/felt* + NEGATIVE ADJECTIVE concordance lines contain at least one co-occurring negative adjective. Extracts 20-24 are examples of this. As discussed in section 2.1.4 of the literature review, the adjective *fat* is deemed pejorative within society. However, body positivity groups and fat studies academics argue that *fat* should not have the abundance of negative connotations it has as it is merely a descriptor (Shroeder 1992; Cooper 1998; Wann 1999; Saguy 2013). Therefore, these groups have reclaimed the word and utilise it as a descriptor with no derogatory intentions. The word *fat* has been utilised in the same manner, with the same non-discriminatory intentions throughout this thesis. However, in these extracts, *fat* has been highlighted as a negative adjective because it is clear from the contexts in which it is used that unlike body positivity and fat activist groups, the individuals are utilising this adjective in a negative and pejorative manner.

Extract 21: Daily Mail 22nd February 2007

I **feel ashamed** to be here. I can't lose weight - I am **fat, lazy and stupid**.

Extract 22: Daily Mail 1st October 2010

They **felt uncomfortable, unhealthy and unattractive**, unable to enjoy sports or find clothes to suit them.

Extract 23: Daily Mirror 13th May 2008

I remember on my 39th birthday feeling totally **depressed** and full of self-loathing. I weighed 21-and-a-half stone and I looked and **felt dreadful**.

Extract 24: The Guardian 2nd June 2012

Soon, I assumed everyone I came into contact with thought I was **fat and ugly**, and my self-esteem fell so **low** I became **depressed**. By my early 30s, I **felt suicidal**

As demonstrated by these examples, the use of multiple semantically negative adjectives further enforces the negative conceptualisation of the fat identity in these stories. Extract 23

is an interesting example as in addition to the negative adjectives, *depressed* and *dreadful*, the noun, *self-loathing* also has deprecating connotations and supports the stigmatising fat identity. The stigmatisation of weight in these personal stories is markedly more overt compared to the general reports about obesity which comprise the remainder of OiBP. Chapters 4 and 5 demonstrate how pervasive linguistic patterns such as metaphors and linguistic strategies such as predication, authorisation and legitimation contribute towards overarching narratives and semantic macrostructures about weight. These include, (i) *obesity is rising rapidly*, (ii) *obesity is detrimental to health and the economy* and (iii) *urgent action and intervention is required*. These macrostructures portray obesity and weight as problematic phenomena, and while there is evidence of these macrostructures in the sub-corpus of personal stories (see section 6.5), there are additional, more overt ways in which the demonisation of weight is linguistically realised throughout these stories. Explicit associations between the fat identities and negative emotions such as depression, low self-esteem, suicidal ideations and shame are frequently made. The explicit nature of the linguistic patterns which pervade these stories is a phenomenon which has not been found in general reports about weight and obesity. The argument can be made that this stylistic difference could be due to the fact that these are personal stories told by individuals affected by the issues under discussion as opposed to journalists, third party individuals who are purportedly held to a higher level of objectivity in their reporting. There is validity to this argument, but an important factor to acknowledge is the fact that even though these individuals appear to be driving the narrative in these articles, their stories have been written by the journalist, who ultimately controls the narrative. Therefore, it can be argued that, while these individuals do have a certain level of agency and their words are used in the stories, certain linguistic components may be highlighted or backgrounded to facilitate and to present a particular archetype to fit a wider agenda or story (see section 6.5). Previous research surrounding

personal stories in news discourse has found this to be the case, where personal stories are orchestrated in a manner which further marginalises the social group under discussion through misrepresentation and pandering to existing stereotypes (Manning-Miller 1994; Kunelius and Renvall 2010; Birks 2017). The same result is present in this research. Despite differences in the micro-linguistic elements of personal stories and general reporting, the overarching messages are the same, the polarising stereotypes remain largely unchallenged and weight is further stigmatised. The interesting and arguably perplexing aspect of this is that in these articles, the stigmatisation and misrepresentation, albeit with assistance from journalists, is carried out by the individuals themselves. The ideological square as a linguistic representation framework utilised in this research argues that individuals represent themselves in a complimentary manner, by *emphasising our positive characteristics* through a variety of different strategies (van Dijk 1998: 246-7). However, it is clear from the evidence presented so far that the self-representation in the personal narratives does not always comply with this theory.

6.4 Negative Self Representation

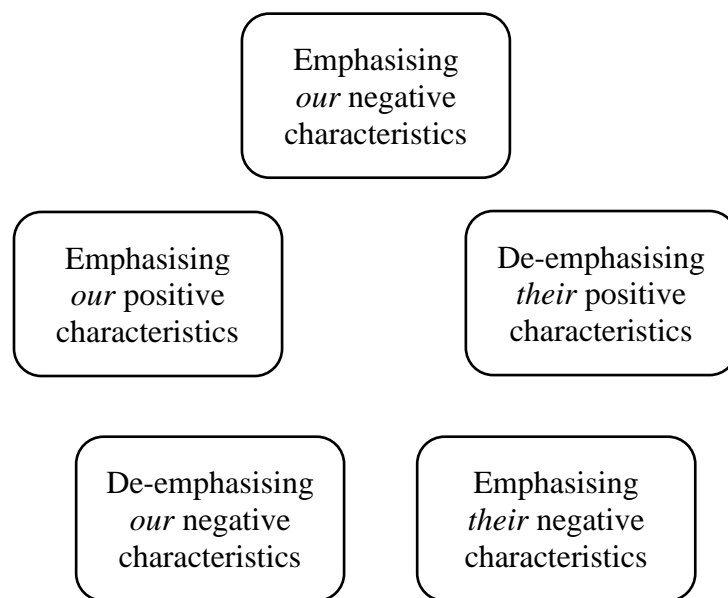
The results of this research thus far have been discussed in terms of van Dijk's ideological square. The analysis in chapter 4 demonstrates how journalists utilise metaphors to *emphasise their negative characteristics* (see section 4.3.5) in relation to obesity and people with obesity. The analysis in chapter 5 demonstrates how journalists *emphasised the positive characteristics* of valued individuals such as scientists and experts (see section 5.3.2). In addition, it was discussed how this model could be applied to positively and negatively deemed issues as well as individuals. The *positive aspects* of phenomena such as weight loss and weight normative approaches to health are *emphasised* and the *negative aspects de-emphasized*. In contrast the *positive aspects* of phenomena such as weight inclusive

approaches to health and ideas such as Health at Every Size are *de-emphasised*. (see section 5.4.2).

The results from *feel/felt* + POSITIVE/NEGATIVE ADJECTIVE analysis comply with this model in some ways and defy it in others. For example, as in chapter 5, positively deemed phenomena such as weight loss is celebrated and *emphasised*. In terms of social identities, the personal stories examined in this portion of analysis feature the voices and stories of individuals from the general public who have been affected by issues relating to weight. Within these stories, two primary identities which are antithetical in nature are conceptualised. One of which possesses traits which include happiness, confidence, attractiveness and thinness and the opposing identity possesses traits which include unhappiness, low self-esteem, unattractiveness and fatness. The thin identity complies with van Dijk's model. When discussing their thin identity, the individuals frequently utilise positive adjectives such as *happy, beautiful, confident* and *fitter* to *emphasise our positive characteristics*. In these stories the thin identity is the superior, desired identity and receives a positive representation. Parallel to the general reports about weight and obesity, a clear thin bias pervades these stories. According to van Dijk and his ideological square, 'biased discourses will tend to be very detailed about *their* bad acts and *our* good acts, and quite abstract and general about *their* good acts and *our* bad ones' (van Dijk 1998: 246-7). When discussing their own fat identity, the individuals in these stories are not general or abstract about their *bad* acts, indeed they are the opposite. Through frequent predication strategies, specifically the use of adjectives, the individuals who are ostensibly driving the narrative are specific and overt about their own *bad* acts and characteristics. The individuals featured in these stories describe feeling *ashamed, guilty, unattractive* and *uncomfortable* prior to weight loss. In addition, these adjectives are used in reference to other acts societally deemed *bad* such as *binge eating, cheating on diets, raising an overweight child* and *utilising NHS services* (see Table

6.6). Therefore, the results seen in this specific aspect of analysis reflect the opposite of and highlight a gap in van Dijk's model. Presently, it does not account for internalised bias against oneself and the expression of these internalised biases. Internalised bias refers to self-directed stigma, it is prolific in marginalised groups and there is an abundance of evidence correlating it to many aspects of identity, including but not exclusive to weight. For example, internalised biases can include internalised homophobia (Mntungwa and Ngema 2018), internalised misogyny (Brown 1994; Enns 2004), internalised racism (Seet 2019), internalised ableism (Kumari-Campbell 2008) and internalised weight bias (Wang, Brownell and Wadden 2004). In addition to an abundance of evidence corroborating internalised bias as a phenomenon, section 2.7 of the literature review demonstrates that there are multiple other studies examining personal narratives in news discourse whose results display evidence of internalised bias (Lens 2002; Birks 2017). Semino et al. (2017) also highlight in their research (discussed in section 2.5), how cancer patients use military metaphors to disempower themselves. The phenomena of self-disempowerment and internalised biases discursively manifesting in discourse is less frequent and is an area which requires further academic research. However, the results provided in this chapter of analysis have demonstrated that the individuals within these personal stories have internalised fatphobic and at times, sexist ideologies and are reproducing them in their self-representations. Therefore, it can be argued that the results from this analysis and the results from previous research provide evidential justifications to expand van Dijk's ideological square by adding an additional element, *emphasising our negative characteristics*, creating an ideological pentagon (see Figure 6.1).

Figure 6.1: Proposed Ideological Pentagon



Although their stories are filtered through the lens of journalists and editors, who may choose to foreground and emphasise the individuals' negative ideologies and words against themselves, there is still a large amount of evidence demonstrating internalised thin biases in the individuals at the core of these stories. The individuals still *emphasise our negative characteristics*, characteristics which could then be further emphasised by the structural decisions of the journalists. Therefore, based on this evidence and evidence found in previous research, it can be argued that there are justifications to explore expansions in linguistic theories surrounding positive and negative representations in discourse.

6.4.1 Further Emphasis of Our Negative Characteristics

It is clear from the results of the *feel* and *felt* analysis that the individuals featured in the news reports conceptualise their feelings and emotions in such a way that, at times, overtly incites two separate and polarised identities. These identities are a pre-weight loss self whose emotions and characteristics include sadness, low self-esteem and bad health and the dichotomous post-weight loss self whose emotions and characteristics include happiness, confidence and good health. In addition, as most of the stories are about women, oppressive

beauty ideals which, societally disproportionately target women, are also woven into these polarised identities. As discussed in the previous section, these conceptualisations, the fat identity in particular, reveal the internalised weight-based biases the individuals harbour and used to harbour towards themselves. In order to further examine these biases and establish if the contrastive identities are enforced beyond an emotional scale, the decision was made to look further into how the individuals at the core of these stories represent themselves. This was achieved by further examining the first-person personal pronoun *I* which is featured on the keyword list (see Table 6.2).

The first indication that antithetical identities would additionally be found in this aspect of analysis came from the results of the collocation analysis. As this analysis was exploratory, with no pre-conceived notions as to what collocates could be found, the collocation span was expanded to from L0, R1 and R2 (used in the *feel/felt* analysis, see section 6.3), to L5, R5. However, once the results were generated it was the R1 collocates which became of particular interest. Within just the top 5 R1 collocates of *I*, the before and after temporal contrasts seen previously in the *feel/felt* analysis are immediately realised (see Table 6.8).

Table 6.8: R1 Collocates of *I* in the Personal Stories Sub-Corpus

R1 Collocates of <i>I</i> (n= 12,828)		
#1	was	1728
#2	had	590
#3	have	541
#4	don't	417
#5	am	373

In Table 6.8 there are present and past variations of the verbs *have* and *be*, *am* being the present tense of the verb *to be* and *was* being the past tense. The decision was made to further investigate *was* and *am* because these verbs relate to identity and this analysis is centred around identity representations. Therefore, an analysis into the *I + was* and *I + am*

concordance lines and their surrounding sentences was carried out to further determine the extent to which antithetical identities are enforced. In the previous *feel/felt* analysis, the thin and fat identities are overt and realised through explicit linguistic choices. Therefore, when carrying out this subsequent portion of analysis, the primary focus was on explicit identity realisations. For example, statements such as ‘two years ago *I was* living in Newport beach California’ which do not reveal specific information about the individual’s conceptualisation of their identity were excluded and not investigated any further. Beginning with the *I + was* collocate pair, 725 out of the 1728 occurrences explicitly and directly engage with the antithetical identities seen previously. Extracts 25-30 are examples of this.

Extract 25: The Sun, 16th January 2012

I was self-conscious all the time and I hated showing my body in any way.

Extract 26: Daily Mail, 15th December 2011

I was fat and **ugly**, and **my self-esteem fell so low** I became **depressed**.

Extract 27: The Mirror August 23, 2007

I was too ashamed of my body to try talking to girls. Why would they want to be seen with someone like me?’

Extract 28: Daily Mail, 14th June 2006

I was sick with **shame**.

Extract 29: The Guardian January 16, 2009

I was scared of never getting married because **I was too fat** and nobody would want to marry me

Extract 30: Daily Mail, 6th June 2006

I was so fat that **I wanted to die**.

These extracts demonstrate how this collocate pair engage with and introduce the fat identity in these stories. There are many parallels to the *feel/felt* collocate pair with adjectives

previously seen such as *shame*, *depressed* and *self-conscious* used in co-occurrence. In addition, it is clear, as these extracts demonstrate that this pervasive collocate pair conceptualise the fat identity in a deprecating, devastating manner and that they further contribute towards the negative fat identity created in these stories. The semantic implications of *was* propose that the individuals are now *better*, *proud*, *happy* and *confident*. An argument can be made that because of this, these particular findings do not provide evidence for the proposed missing component to van Dijk's ideological square, *emphasising our negative characteristics*. However, although it is past tense, these examples clearly demonstrate the internalised weight bias these individuals held against themselves and they describe themselves in a pejorative manner. Therefore, they are *emphasising our negative characteristics*. An interesting strategy which can be seen in these examples is that the individuals are *emphasising our (past) negative characteristics* in order further *emphasise our (present) positive characteristics*. In the stories about weight loss, these individuals are using a negative past comparison of themselves, in which they are self-deprecating, in order to fulfil a wider goal of positive self-representation.

Similar results were found in the *I + am* concordance analysis. In total, the *I + am* collocate pair occurs 373 times and 139 directly engage with the antithetical identities found previously. An interesting finding from the analysis of their concordance lines was that, in addition to presenting a present, thin and happy identity (see extracts 31-34), they also introduce a present unhappy fat identity (see extracts 35-38). The thin identity is the most prevalent, accounting for 80 out of the 139 concordance lines under analysis. These examples and their implications mimic those found in the *feel/felt* analysis.

Extract 31: The Sun, 18th March 2012

I have my health back and **I am a very happy** person and have such a positive outlook on life.

Extract 32: Daily Mirror, 9th December 2012

Within a year, she has lost 10st. "**I am** like a **different person**, I have got my mojo back," she says

Extract 33: The Times, 3rd January 2010

I am free in that I don't think about food all the time anymore. I live my life.

Extract 34: Daily Mail, 30th September 2006

Having the gastric band operation is one of the best things I've ever done. **I am healthy, slim**, I feel ten years younger and more confident and everyone says I have my sparkle back.

Through the *I + am* collocate pair, the positive, healthy and happy thin identity is enforced and complies with van Dijk's model by *emphasising our positive characteristics*. Similar to the *I + was* collocate pair, these extracts demonstrate that when talking about their present self, they use temporal linguistic constructions to create a contrast with their past, fat identity. 'I have my health *back*' in extract 31, 'within a year' in extract 32, 'anymore' in extract 33 and 'having the gastric band operation' in extract 34 all make implicit references to the individuals' past lives and past selves. The evidence suggests that even when not explicitly referenced, there is still a reliance on a comparison to their past fat identity, for which they *emphasise the negative characteristics*, in order to further highlight the transformation into their present thin identity, for which they *emphasise the positive characteristics*. All of the evidence gathered sustains that a thin bias courses through the obesity media narrative. The way in which this is achieved is through the idealisation of thinness with reports using prevalent linguistic patterns and predication strategies to heavily correlate it to happiness, beauty and confidence. These prevalent linguistic patterns and predication strategies are also used to demonise weight by creating an antithetical unhappy fat identity. The *I + am*

collocate pair conceptualises both the identities in these stories. In addition to presenting a happy, thin identity, it also represents a present unhappy fat identity (n= 59).

Extract 35: The Sun, 17th April 2013

I really want to change. **I am gross and a whale** - I don't look normal.

Extract 36: Daily Mail, 28th August 2014

I am among the one in four people in the UK who are clinically obese. Half of all of us in Britain are overweight and we will cause a **terrible strain on the NHS** if we carry on this way.

Extract 37: The Sun, 7th January 2006

Everyone thinks **I am happy, but it's all show.**

Extract 38: Daily Mail, 21st March 2013

I want to **change who I am** entirely

These examples are a clear representation of individuals using negative predication strategies to *emphasise our negative characteristics*. In addition, they provide further evidence that the fat identity is a present identity and one which the individuals in these stories are willing to denigrate. The self-denigration found in these stories is interesting and provides evidence that weight bias is a prolific phenomenon. In these stories, the general reports about obesity and embedded within societal messaging about weight, is a fundamental aversion to fatness. In the face of oppression, people can respond with resilience, resistance and rebellion, or they can internalise it and seek approval from their oppressors (Wann 2017: 67). The evidence discussed in this chapter demonstrates how the individuals in these stories do the latter. The resilience, resistance and rebellion are targeted towards their weight as opposed to oppressive cultural ideals surrounding weight. When discussing their weight loss they overtly and arguably over-emphasise their societally deemed *negative characteristics*. In these extracts the individuals detail how they are unhappy and how they believe they are unattractive and a

burden on society. These are all key aspects of the societal ideologies surrounding weight and obesity, they degrade and oppress individuals, yet they are echoed by those oppressed individuals. Gaining a modicum of social approval in a system which inherently rejects them could be why the individuals choose to *emphasise our negative characteristics*. The final question this analysis explores is the motivation behind the newspapers in the publication of such overt stigmatising content.

6.5 The Wider Commercial Goals of the Newspapers

As discussed in section 2.7 of the literature review Birks (2017) and Lens (2002) argue that personal stories use members of the public to instrumentalise the newspapers' wider political campaign goals. This process reduces ordinary people to 'symbol people', who become a beacon of representation which, when combined with the journalistic story format, marginalises them further. The evidence gathered from the analysis of personal stories in the obesity media narrative has proven that negative and stigmatising representations of weight can be found in abundance. The question still remains as to why. In the general reports about obesity, there are clear overarching semantic macrostructures; *obesity is rising rapidly*, *obesity is detrimental to health and the economy* and *urgent action and intervention is required*. Birks' (2017: 1346) argument that personal narratives are utilised to ratify broader social and political ideologies can be applied to this investigation too. The principal positions all the newspapers under investigation take in regard to weight are synonymous and clear from the semantic macrostructures. The specific micro-linguistic patterns analysed in the personal stories can overtly promote these semantic macrostructures. For example, extract 39 distinctly endorses the *obesity is detrimental to health and the economy* macrostructure.

Extract 39: The Mirror, 6th June 2006

**I was 24st. I was quite depressed, I was on the verge of developing diabetes
and I was having trouble breathing**

In addition, extract 36 in section 6.5 makes repeated references to the prevalence of obesity, ‘*one in four* people in the UK who are clinically obese. *Half of all of us* in Britain are overweight’. It also makes reference to the use of NHS services, ‘we will cause a *terrible strain on the NHS* if we carry on this way.’ This extract overtly contributes towards the *obesity is rising rapidly* and the *obesity is detrimental to health and the economy* semantic macrostructures. It can also be argued that as many of these linguistic patterns correlate fatness with misery and refer to weight loss and weight loss efforts, the *urgent action and intervention* macrostructure is further supported. To gather a clear idea about the semantic macrostructures identified previously and if and how they apply to these stories, a qualitative analysis of the articles in the personal stories sub-corpus was carried out. The purpose of this was to clearly identify if the personal stories are used, as Birks (2017) suggests, to advocate for the general themes and messages surrounding obesity.

The personal narrative sub-corpus is comprised of 604 articles, of which 601 overtly support the semantic macrostructures found in the general reports about obesity and support the argument that personal narratives are orchestrated in a manner which will support the wider goals of the newspapers. The three articles which do not support the predominant macrostructures are notably all published in broadsheet newspapers; *The Guardian*, 9th July 2006, *The Times*, 24th January 2009 and *The Daily Telegraph*, 25th January 2015. These articles offer a counter-narrative to the one seen throughout the analysis so far. They engage with ideas about body positivity and Fat Acceptance, weight inclusive approaches to health and the individuals object to the idea that a fat identity is inherently negative. Referring back to Wodak and Reisigl’s (2001) strategies of representation, the clear absence of counter narratives which mitigate the weight related stereotypes is an example of *intensification and mitigation*. Intensifying and mitigation strategies include sharpening and toning down certain aspects of an issue in order to generate a particular identity for individuals and groups Wodak

and Reisigl (2001: 45). This was a primary strategy discussed in chapter 5 and is also present in the personal stories. The difference between the predication strategies seen in this chapter and the intensification and mitigation strategies is that the individuals sharing their stories are not the individuals carrying out the intensification and mitigation strategy, it is the journalists. The choice to largely exclude people who do not adhere to dominant ideals about weight is that of the newspapers.

Extract 40 is an article from the personal stories sub-corpus which demonstrates how the semantic macrostructures are supported and embedded within the 601 personal stories which do engage with them. This is largely achieved by editorial information and commentary which aligns with the semantic macrostructures being interspersed within and throughout the personal stories.

Extract 40: The Daily Express, 2nd June 2009

GROWING PAINS;

Childhood **diabetes is on the rise** but, as Caroline Jones reports, it isn't the only adult **health problem affecting our youngsters**

Modern life is taking its toll on today's children. Medics warn that those as young as eight are being **diagnosed with high cholesterol - this is on top of ever-rising levels of obesity.**

[...]

Experts blame unhealthy lifestyles with their mix of too much fast food, little exercise and an obsession with the latest fashions and gadgets. As a result, doctors say kids are fat, miserable and old before their time.

[...]

More than a third of children aged two to 15 are **overweight** and

Government figures predict that **by 2050 these figures will have doubled.**

This will lead to a host of **weight related health problems.**

Children as young as six are now having **gastric band operations.** Some obese teenagers are being **referred for hip and knee problems** as their **developing joints are placed under too much strain.**

[...]

Amber Hawes, 16, from St Austell, Cornwall, weighed 15 stone two years ago

I had always struggled with my weight and by the time I was 14 I was wearing size 18 clothes and felt like an overweight old woman. **When I tried to walk upstairs my heart would start pounding and I could hardly breathe.**

I couldn't keep up in PE and **suffered with back pains from carrying all that weight** around. My diet was pretty bad. Sometimes I'd barely eat in an attempt to "be good" but then, when I did eat, I would have huge amounts of chocolate or crisps. The kids at school used to call me Buffalo and ask, "Can you feel the floor moving?" when I walked past. It was really hurtful. I'd come home and cry my eyes out.

I was in denial about my size but at the back of my mind **I knew I could die** at an early age because of what I was doing to my body. One Christmas I was given some money and mum suggested I use it to **join Slimming World, a weight-loss club** which now runs a course for teens. She went with me for support. When the scales said 15 stone I was shocked.

The classes taught me how to **eat a healthy diet** and that eating well is all about moderation, not cutting any food out completely. They also **encouraged**

me to exercise, which was hard at first. Now I play hockey for my school.

I've lost more than three stone and now wear size 12 clothes. I've got a new lease of life. I'm so much happier and more energetic. Going to the beach and running around with my dogs is just amazing. I feel like a normal teenager for the first time.

Visit www.slimmingworld.com for more details.

As demonstrated by this example article, facts and statistics about obesity are peppered abundantly throughout the article, tethering the narrative back to the overall messages that *obesity is rising rapidly, obesity is detrimental to health and the economy and urgent action and intervention is required*. For example, obesity levels are described as 'ever rising', and 'by 2050 these figures will have doubled', the individual states that she 'suffered from back pain from carrying around all that weight' and asserts that 'I knew I could die because of what I was doing to my body.' These statements support the ideologies that *obesity is rising rapidly*, and that *obesity is detrimental to health and the economy*. In addition, *the urgent action and intervention is required* macrostructure is supported as the article appears to be an advertisement, promotion or endorsement for the diet club, Slimming World. This notion is evidenced by statements such as 'My mum suggested I use it to join Slimming World, a weight-loss club which now runs a course for teens' and 'visit www.slimmingworld.com for more details'. This finding is not exclusive to this specific article. In addition to aligning the personal stories with the overall messages of the newspaper, it became clear whilst conducting this analysis that there are commercial incentives for newspapers to enforce these specific macrostructures, pedal the antithetical thin and fat identities and mitigate certain perspectives surrounding weight. Copious and explicit advertisements from companies which would benefit from the negative weight-based ideologies can be found within these stories. These companies include diet companies such as Weight Watchers, authors of diet and cookbooks,

workout DVDs and many other organisations within the diet industry field. Table 6.9 contains the exact frequencies of advertisements in the personal stories.

Table 6.9: Advertisements in Personal Stories

Advertisement	Frequency
Diet Plan	107
Obesity Television Show	32
Private Weight Loss Surgery	27
Diet Book	20
Weight Loss Camp	18
Diet Website	11
Workout DVD	8
Government Programme	8
Diet Pill	6
Total	237

A total of 237, which equates to 39.2% of the personal stories analysed contain overt advertisements for products and resources which are centred around weight loss. Extracts 41-45 are examples of the advertisements found.

Extract 41: The Daily Mail, 20th June 2011

Want to shed pounds? Go to **Weight Watchers**.

Extract 42: The Daily Express, 2nd June 2009

I'm so much happier and more energetic. Going to the beach and running around with my dogs is just amazing. I just feel like a normal teenager for the first time. Visit **slimmingworld.com** for more details.

Extract 43: The Sun, 10th January 2012

Nicola is the perfect poster girl for these exercises as she has done them for ten years and kept the weight off. 'If we inspire just one person to do the same

through this **DVD**, it would be the greatest reward of all.’ The **workout DVD** **is out now** on 2entertain.

Extract 44: The Daily Mail, 18th July 2009

Valentina can’t wait for her school friends to meet the new her. And when she walks into school at the start of terms, everyone’s going to say: ‘Wow!’, ‘Well done!’, ‘You look great!’. **Visit www.wellspringcamp.co.uk**

Extract 45: The Daily Mirror, 22nd April 2009

The diet pill Alli is now available for the first time over the counter in UK pharmacies. With obesity on the rise in the UK along with accompanying health risks such as heart disease, type 2 diabetes and some cancers, we need every possible tool to help us keep our weight under control.

Consumer trend reports estimated the value of the global weight loss market during the time in which these articles were published to be approximately £220 billion (Crimson Hexagon 2015). Therefore, this is an industry with a lot of power, who capitalise on the insecurities individuals face as a result of the pervasive discrimination of weight. These insecurities are exploited and consume the narrative in these stories. Stories which ostensibly appear to be controlled by the individuals themselves but are arguably controlled by the newspapers, as their voices are used as variables for the newspaper’s narrative and ideological agenda. Newspapers that are obliged by an advertisement deal with a faction of the multi-billion-pound weight loss industry to project a certain narrative, thereby mitigating contrasting narratives. The purpose of many of these stories is not to allow individuals’ voices to be heard, but to perpetuate negative ideologies surrounding weight and positive ideologies surrounding thinness to entice readers into purchasing certain products, watching certain television shows and using certain services. Therefore, the evidence suggests that the answer to the question surrounding whether the individuals at the core of this issue are given any

agency appears to be, only certain individuals, under certain circumstances. As discussed in section 6.4, the individuals in these stories contribute towards the representation of themselves. However, the choice to give them a platform and allow their voice to be heard is made by the newspapers. As detailed by the analysis, only certain types of individuals with certain types of stories, stories which align with the dominant semantic macrostructures and can be used to fulfil wider advertisement obligations are selected. The mitigated aspects such as body positivity and weight inclusive approaches to health, results in the misrepresentation and stigmatisation of weight.

In addition to newspapers, the weight loss industry utilises many forms of mainstream media as an advertisement platform including television, magazines and social media (Harper and Tiggimann 2008; Willis and Knobloch-Westerwick 2014; Ethan et al. 2016; Pilgrim and Bohnet-Joschko 2019). These studies have results parallel to this study, whereby binary understandings of body weight, which project thin as aspirational and fat as deviant, are enforced. The effects of this create misinformation surrounding weight and health, increase anti-fat biases, weight related appearance anxiety and can lead to unhealthy and disordered approaches to health (Botta 2003; Geier, Schwartz and Brownell 2003; Harper and Tiggimann 2008; Willis and Knobloch-Westerwick 2014). In addition, as women are often the primary target of weight loss advertisements (Blaine and McElroy 2002), and most of the personal stories found in the corpus focus on women, this is further evidence that weight loss is framed as more of a gendered, women's issue than a societal issue in the corpus. Given that the media is the primary source in which the general public obtain the majority of their health-related knowledge (Clarke et al. 2003), the advertisements they are exposed to can have a significant influence on attitudes towards weight and the health of the individuals. At present, the representation of weight and health in these stories is one dimensional and marginalises a large group of people. While this is a capitalist society and businesses

including newspapers and those in the health industry need to survive, it can be argued, on the basis of the results of this research and research carried out previously, that more informative and less stigmatising advertisements need to be enforced.

6.6 Chapter Conclusions

This chapter focused on a sub-corpus of personal stories from members of the general public about weight and assessed whether their narrative propagates or challenges the stigmatising ideologies surrounding weight seen in the analysis so far. The keyword analysis indicated that a prevalent theme throughout the stories is weight loss, with lexical items such as *weighed*, *dieting*, *heaviest* and *weighs* appearing within the top 50. In addition, the verbs *feel* and *felt* are both keywords and are frequently utilised in these stories. This was deemed an interesting line of enquiry because in the general reports about obesity, it has been evidenced (see chapters 4 and 5) that obesity as a phenomenon has been dehumanised. These verbs introduce emotions and are inherently humanising, which indicated that there could be a deviation in the narratives in these stories compared to the general reports about obesity. Therefore, these verbs, their collocations, concordance lines and co-text were further analysed to explore four primary research questions:

- (i) How are the feelings of the individuals under discussion conceptualised?
- (ii) To what extent is weight gain and/or weight loss a contributing factor to these feelings?
- (iii) Are the same semantic macro-structures present in general reporting also found in personal stories?
- (iv) To what extent do the personal narratives contest or support the disparaging representation of weight found in prior chapters.

The collocation analysis of *feel* and *felt* revealed a prevalent pattern of adjective collocates (see section 6.3). Many of these adjectives had stark positive or negative semantic

connotations and were organised accordingly for the subsequent analysis (see Tables 6.3 and 6.4). The concordance lines and surrounding sentences of the *feel/felt* + POSITIVE ADJECTIVES were qualitatively analysed first and clear antithetical pre- and post-weight loss identities began to emerge (see section 6.3.1 and 6.3.2). The thin identity is realised through the positive adjectives and is conceptualised as an individual who *feels proud, attractive, happy* and *confident*. The primary topic this identity is discussed in reference to is weight loss (88.6%), whereby the thin identity is a new post-weight loss identity for the individuals which is romanticised by the positive adjectives used to conceptualise it (see Table 6.5). The theme of weight loss and the idealisation of thinness also feeds into the wider narrative and semantic macrostructures present in the whole corpus such as *urgent action and intervention is required* and *obesity is detrimental to health and the economy*. In addition, as most of the personal stories analysed were about women (68.5%), themes of weight loss and thinness also feed into wider, oppressive beauty standards and the social ideology that weight is a women's issue. Analysing the surrounding co-text of the *feel/felt* + POSITIVE ADJECTIVE collocate pairs led to the discovery of the frequent co-occurrence of presupposition triggers. Temporal and comparative presupposition triggers such as *before, now, after, again* and *better* are frequent collocates (n= 90) of the *feel/felt* + POSITIVE ADJECTIVE collocate pair (n= 193). The individuals describe feeling confident *now*, proud *again* and *better after* weight loss, creating an implication that before weight loss, they had low self-esteem and felt bad and ashamed. Therefore, the *feel/felt* + POSITIVE ADJECTIVE collocate pairs explicitly enforce a positive happy, attractive thin identity and implicitly, through the co-occurrence of presupposition triggers, enforce an antithetical fat, unhappy and unattractive identity. The results of the *feel/felt* + NEGATIVE ADJECTIVE collocate pairs reinforced the antithetical identities found in the stories. Weight loss is the most prevalent topic the *feel/felt* + NEGATIVE ADJECTIVE collocate pairs are used in reference to (55.7%), but the overall percentage is

notably less compared to the *feel/felt* + POSITIVE ADJECTIVE collocate pairs. This is because negative adjectives are utilised to conceptualise a present, unhappy fat identity in addition to a past, pre-weight loss fat identity. With this collocate pair, the implicit inferences of an unhappy, unattractive and shameful fat identity become explicit assertions, ‘I looked and *felt dreadful*’, ‘I *feel terrible* as I know I’m letting myself down’ (see section 6.3.3). The character traits attributed to this identity mimic the pervasive societal stereotypes about weight, providing more evidence that the individuals in these stories have internalised these arbitrary ideals. The analysis also revealed a pattern of additional lists of negative adjective collocates, used to further reinforce the negative fat identity (see Table 6.7). For example, individuals describe feeling ‘*hopeless, defeated, ashamed and embarrassed*’, ‘*uncomfortable, unhealthy and unattractive*’. The pattern of negative self-representation was further evidenced from the *I + was* and *I + am* collocate pair analysis (see section 6.4.1). This indicates that the writers of these stories favour negative portrayals of weight, frequently counterbalancing positive narratives with negative inferences and reinforcing negative narratives with further negative inferences.

The final question this chapter explores is the motivation behind the newspapers in the publication of such overt stigmatising content. Copious and explicit advertisements from companies within the weight loss industry who financially benefit from negative weight-based ideologies can be found within these stories (see Table 6.9). Therefore, the personal narratives are being utilised, at least in some cases, to facilitate a wider commercial and financial goal. This indicates that, in order to fulfil this goal, only certain individuals with certain viewpoints will be highlighted. These viewpoints, as indicated by the analysis, include positive ideologies towards thinness and negative ideologies towards fatness. Therefore, the personal narratives support the disparaging representation of weight found in the prior chapters of this research.

Overall, the personal stories analysed in this corpus create a reductive archetype of weight and the lived experience of obesity. The pervasive linguistic patterns in the stories create two antithetical thin and fat identities, each of which are associated with stereotypical and reductive ideals. The sociological impact of which is problematic because these individuals and their conceptualisation of themselves are held up as a beacon of representation. This representation is inaccurate, misrepresentative and supports and propagates stigmatising and negative stereotypes about weight and health. It is clear that the motivation behind sharing personal stories is not to give marginalised individuals a platform, but to contribute to a wider media narrative and to fulfil the financial goals and obligations of the newspapers, despite the sociological impact.

7. Conclusion

This thesis has focused on the representation of obesity and individuals with obesity in British news discourse, and the results provide extensive evidence of a selective, misrepresentative and sensationalised narrative. The literature review (chapter 2) revealed that weight bias is a pervasive phenomenon which can be psychologically and physically detrimental (section 2.1). In addition, previous studies demonstrated that the media are predominant perpetrators of biased ideologies and attitudes towards weight (section 2.4). The results of this research reveal how a narrative imbued in fear and social divisiveness is perpetuated through prevalent and normalised hyperbolic and metaphorical constructions (chapter 4). Furthermore, it explored how the use of power, persuasion and expert opinion dominates the discourse and legitimises facts which are decontextualized, distorted and, as such, shape and contribute towards a misrepresentative portrayal of weight and health (chapter 5). Finally, it examined how individuals at the core of the issue represented themselves through personal stories and disempowered themselves by parroting and reproducing stigmatising ideologies about themselves and their weight (chapter 6). These findings were the results of an investigation with three primary aims:

- (i) Identify the key and prevalent linguistic patterns and messages surrounding obesity in British newspapers.
- (ii) Investigate how individuals with obesity are conceptualised within these linguistic patterns and messages.
- (iii) Explore the extent to which the linguistic patterns and messages under analysis perpetuate weight bias and stigmatising attitudes.

The analytical approach taken was a corpus-assisted Critical Discourse Analysis. Corpus Linguistics (CL) tools and techniques were utilised to establish frequent and statistically significant lexical and grammatical patterns and Critical Discourse Analysis (CDA) was the

approach taken when carrying out the qualitative aspects of the analysis. Harnessing the efficiency and reliability of Corpus Linguistics methods and the breadth and comprehensiveness of CDA, produced large amounts of linguistic evidence from which astute, well-defined conclusions about language, weight and society could be drawn. The internal framework for the qualitative analysis in this thesis comprised three main components; van Dijk's (1980) notion of semantic macrostructures, van Dijk's (1998) ideological principles of representation which include emphasising and de-emphasising positive and negative characteristics and Reisigl and Wodak's (2001) five discursive strategies of representation. These frameworks were chosen because there was evidence of and patterns of each strategy in many of the research areas explored in the literature review. The prevalent linguistic patterns and their semantic connotations and implications which have been analysed in OiBP such as metaphors, referencing expert sources, VERB + ADJECTIVE colligation patterns and presupposition triggers, all fulfil one or multiple strategies of representation. Strategies of social representation including *reference* and *predication*, whereby positive or negative references and qualities are attributed to social groups and *intensification* and *mitigation*, whereby certain aspects of social groups are emphasised or de-emphasised to fulfil ideologically oriented goals (Reisigl and Wodak 2001: 45), were found in abundance in OiBP. Through these representation strategies, the positive and negative characteristics of obesity and people with obesity are emphasised and de-emphasised to fulfil a narrative in which obesity and weight are demonised and people with obesity are demoralised. This narrative is comprised of three key messages; (i) *obesity is rising rapidly*, (ii) *obesity is detrimental to health and the economy* and (iii) *urgent action and intervention is required*. In each analysis chapter it is argued that this narrative is problematic because it is a reductive and misrepresentative overview of obesity and stigmatises people with obesity. Specifically, it is argued in chapter 4 that the prolific use of war and epidemic metaphors,

used to enforce the messages that *obesity is rising rapidly* and *urgent action and intervention is required*, are dehumanising and socially divisive. In chapter 5, it is argued that the use of quotes and paraphrased statements from scientists and experts, who discuss actions to be taken in response to obesity and the health ramifications of obesity, misrepresent and sensationalise the issue. In addition, it is highlighted in both chapters 4 and 5 that certain important contextual information is either overly highlighted or mitigated from the narrative entirely which works to further misrepresent the issue of obesity. Finally, in chapter 6, it is argued that the personal stories featured in news articles about weight and obesity idealise thinness, demonise fatness and perpetuate stereotypical generalisations about weight. This is problematic because newspapers are an influential industry, are responsible for enormous amounts of language output, and research has shown they can influence social and cultural perceptions (Krishnamurthy 1996; Joffe and Haarhoff 2002; Thibodeau and Boroditsky 2011; Hendricks et al. 2018). At present, societal perceptions of obesity and people with obesity are such that bias and stigmatisation exist in almost every social and professional situation (Puhl and Brownell 2001). Weight discrimination is one of the last socially acceptable forms of discrimination and is built on a foundation of negative and inaccurate stereotypes which dictate that those with obesity are lazy, gluttonous, unattractive, unintelligent and lack will-power (Puhl and Brownell 2001: 798-800). These perceptions and stereotypes are supported, reinforced and perpetuated by the prevalent linguistic patterns within OiBP. As discussed, the media's influential platform has the power to challenge narratives and shift perceptions. However, the results of this research have demonstrated that within these articles, in place of compassion there is dehumanisation, in place of balance there is sensationalism and in place of respect, there is pervasive stigmatisation.

7.1 Critical Reflections

As discussed, the method used in this research was a corpus-assisted Critical Discourse Analysis. The application of this synergised method proved predominantly helpful, with the computational properties of Corpus Linguistics effectively complementing the nuanced, context sensitive and closer critical analysis. The internal framework of analysis, also synergised in its application, was likewise largely effective. For example, the semantic macrostructure framework allowed for explorations and discussions about the specific key messages which sat on the shoulders of the prevalent linguistic patterns found within the corpus. In addition, one of Reisigl and Wodak's (2001) five linguistic strategies of representation encourages analysts to explore the mitigated aspects of a discursive representation as well as the foregrounded aspects. This analytical direction produced a rigorous contextual analysis which is particularly compelling in chapter 5, as it led to the discovery that misrepresentation in the media narrative surrounding weight and health is significant. An aspect of the internal framework which did not entirely correspond with the results found in the analysis was van Dijk's ideological square framework, the logic behind which dictates that 'biased discourses will tend to be very detailed about *their* bad acts and *our* good acts and quite abstract and general about *their* good acts and *our* bad ones' (van Dijk 1998: 268). In chapter 6 which focussed on personal stories and self-representations, the results demonstrated that internalised bias and self-disempowerment is prolific amongst individuals with lived experience of obesity. Negative self-representation defies the ideological square model, but the results in chapter 6 provide preliminary evidence which proves how negative self-representation can and does occur. Therefore, further analysis is suggested and the notion of expanding the ideological square to an ideological pentagon, incorporating a move which accounts for internalised biases, *emphasise our negative characteristics*, is proposed. As internalised bias is a widely reported phenomenon amongst

members of many marginalised social groups, the addition of this move would create a more extensive model. In addition, as the self-representation of members from marginalised groups is not a discourse type upon which much rigorous linguistic analysis has been performed, expanding the model would create a systematic framework within which future research could be carried out.

7.2 Further Directions

The impact that internalised bias has on linguistic strategies of representation is one of the questions which arises from this research. The results from this portion of analysis are described as preliminary in this thesis because of the small size of the sub-corpus in which they were found. The sub-corpus of personal stories was only 604 articles in size. As a corpus-assisted Critical Discourse Analysis affords discourse analysts the capacity to analyse thousands of articles so that pervasive language patterns can be identified, further and larger scale analyses must be carried out before definitive arguments can be made regarding internalise biases and their effect on linguistic strategies of representation. Although the rest of this research project was large-scale, there are multiple potential areas of expansion and many further directions which could have been taken. For example, the differences between tabloid and broadsheet newspapers was discussed, but an additional way to compare the newspapers analysed could have been political affiliations. OiBP is comprised of both left and right leaning newspapers so this type of comparison would have been interesting to examine and is an area for future analysis. In addition, OiBP contained eleven years-worth of newspaper articles. Therefore, an in-depth investigation into the changing prevalence of the linguistic patterns analysed, and in turn, the semantic macrostructures identified over the course of the eleven-year period is an analytical direction further research could explore. Finally, previous literature such as Couch et al. (2015), reported that individuals with obesity felt disenfranchised and discriminated against by media representations of obesity. This

literature guided some of the discussion points and interpretations of the effects the linguistic patterns analysed could have on readers and their attitudes towards weight and obesity. A research path which could strengthen and elevate these discussions in future research is an analysis focussed on reader responses. This could take the form of questionnaires, focus groups, or given the high prevalence of online news articles, reader comments. Whatever the approach, the possibilities are wide-ranging, and the results would be highly beneficial to discussions surrounding media representations of weight and people with obesity.

7.3 Action Research

This research identified multiple problematic aspects of news reporting about weight and obesity. In terms of actions to be taken which can progress and improve reporting so that it is more informative and less stigmatising, there are several paths which can be explored. Firstly, as identified, the 2010 Equality Act which forms the basis of anti-discrimination laws and practices in the UK does not list weight as a characteristic. In addition, UK press standards also notably omit weight from their discrimination guidelines. Describing weight as a characteristic and a socio-political category, like race and gender, may seem non-sensical to some. However, weight is politicised, weight discrimination is systemic, and the consequences can be life-threatening. Including weight as a protected characteristic under the Equality Act, and in turn, UK press standards would be a positive step towards fairer treatment and fairer media coverage of weight and individuals with obesity. As discussed in the thesis, fair and accurate reporting on weight is challenging as newspapers are not medical journals and the limited space and time means that every aspect of an issue cannot always be covered. However, the results of this research have demonstrated that the misrepresentation extends beyond ignorance. There is an unwillingness it seems to deviate from a narrative which is not sensationalised and one dimensional. To compare, although these media narratives are not free from problems, there have also been thoughtful and insightful pieces of

journalism on the nuances of race relations and LGBTQIA+ issues. Thought and nuance does not appear to exist in the media narrative surrounding weight, yet they are indisputably within reach. For example, as demonstrated in chapter 5, there is a lot of research and scientific content available for journalists to use. In addition, there are an increasing amount of fat and body inclusivity activists who are knowledgeable, trustworthy, and who could be used as sources for news articles. There are many moving parts in journalism and many, such as time, press releases and advertising contracts have been discussed in the thesis. However, the complex nature of the task does not absolve the newspapers of their responsibility to produce accurate, fairer and less stigmatising content. In addition, companies who advertise in newspapers and on their websites could demand fairer reporting by using their advertisement deals as leverage. This action has begun, with the help of the Stop Funding Hate Organization, Lego and Body Shop have stopped advertising with the Daily Mail and Bellroy, Thread and the Phone Co-op have committed to stop advertising in The Daily Mail, The Daily Express and The Sun (Stop Funding Hate 2020). There are multiple, actionable paths to change, and it is possible for compassion to replace dehumanisation, for balance to replace sensationalism and for respect to replace pervasive stigmatisation.

Bibliography

- ADOLPHS, S. (2006). *Introducing Electronic Text Analysis: A Practical Guide for Language and Literary Study*. London: Routledge.
- AFFUL, A.A AND RICCIARDELLI, R. (2015). Shaping the Online Fat Acceptance Movement: Talking About Body Image and Beauty Standards. *Journal of Gender Studies*, 24 (4), 453-72.
- ALBERGA, A; RUSSELL-MAYHEW, S; VON RANSON, K.M AND MCLAREN, L. (2016). Weight Bias: A Call to Action. *Journal of Eating Disorders*, 4 (34), 1-6.
- ANDRUS, J. (2011). Beyond Texts in Context: Recontextualization and the Co-Production of Texts and Contexts in the Legal Discourse, Excited Utterance Exception to Hearsay. *Discourse and Society*, 22 (2), 115-36.
- ANTHONY, L. (2016). SarAnt (Version 1.1.0) [Computer Software]. Tokyo, Japan: Waseda University. Available at: <http://www.laurenceanthony.net/>. (Last Accessed 28/11/2016).
- ATANASOVA, D AND KOTEYKO, D. (2017). Obesity Frames and Counter-Frames in British and German Online Newspapers. *Health*, 21 (6), 650-69.
- BACON, L. (2006). End the War on Obesity: Make Peace with Your Patients. *Medscape General Medicine*, 8 (4), 40.
- BACON, L. (2010). *Health at Every Size*. Dallas: Benbella Books.
- BACON, L AND APHRAMOR, L. (2011). Weight Science: Evaluating the Evidence for a Paradigm Shift. *Nutrition Journal*, 10 (9), 1-14.
- BAKER, P. (2005). *Public Discourses of Gay Men*. London: Routledge.
- BAKER, P. (2006). *Using Corpora in Discourse Analysis*. London: Bloomsbury.
- BAKER, P. (2010). *Edinburgh Sociolinguistics: Sociolinguistics and Corpus Linguistics*. Edinburgh: Edinburgh University Press.

- BAKER, P AND GABRIELATOS, C. (2008). Fleeing, Sneaking, Flooding: A Corpus Analysis of Discursive Constructions of Refugees and Asylum Seekers in the UK Press, 1996-2005. *Journal of English Linguistics*, 36 (1), 5-38.
- BAKER, P, GABRIELATOS, C, KHOSRAVINIK, M, KRZYŻANOWSKI, M, MCENERY, T, WODAK, R. (2008). A Useful Methodological Synergy? Combining Critical Discourse Analysis and Corpus Linguistics to Examine Discourses of Refugees and Asylum Seekers in the UK Press. *Discourse and Society*, 19 (3), 273-306.
- BAKER, P, GABRIELATOS, C AND MCENERY, T. (2013a). *Discourse Analysis and Media Attitudes: The Representation of Islam in the British Press*. Cambridge: Cambridge University Press.
- BAKER, P, GABRIELATOS, C AND MCENERY, T. (2013b). Sketching Muslims: A Corpus Driven Analysis of Representations Around the Word ‘Muslim’ in the British Press 1998–2009. *Applied Linguistics*, 34 (3), 255–78.
- BAKER, P, HARDIE, A AND MCENERY, T. (2006). *A Glossary of Corpus Linguistics*. Edinburgh: Edinburgh University Press.
- BAUER, M. (2009). The Evolution of the Public Understanding of Science Discourse and Comparative Evidence. *Science, Technology and Society*, 14 (2), 221-40.
- BAXTER, J. (2018). *Women Leaders and Gender Stereotyping in the UK Press: A Poststructuralist Approach*. Switzerland: Springer International Publishing AG.
- BELL, A. (1994). Climate of Opinion: Public and Media Discourse on the Global Environment. *Discourse and Society*, 5 (1), 33-64.
- BERLINER, D. (2017). Contradictions: From the Intrapersonal to the Social and Back. *HAU: Journal of Ethnographic Theory*, 7 (2), 45-49.
- BIRKS, J. (2017). ‘Moving Life Stories Tell Us Just Why Politics Matters’: Personal Narratives in Tabloid Anti-Austerity Campaigns. *Journalism*, 18 (10), 1346-63.

- BLAINE, B AND MCELROY, J. (2002). Selling Stereotypes: Weight Loss Infomercials, Sexism, and Weightism. *Sex Roles*, 46, (9/10), 351-57.
- BLOOR, M AND BLOOR, T. (2007). *The Practice of Critical Discourse Analysis: An Introduction*. London: Hodder Education.
- BOCQUIER, A, VERGER, P, BASDEVANT, A, ANDREOTTI, G, BARETGE, J, VILLANI, P AND PARAPONARIS, A. (2005). Overweight and Obesity: Knowledge, Attitudes, and Practices of General Practitioners in France. *Public Health and Public Policy*, 13 (4), 787-95.
- BOERO, N. (2007). All the News That's Fat to Print: The American "Obesity Epidemic" and the Media. *Qualitative Sociology*, 30 (1), 41-61.
- BOERO, N. (2013). Obesity in the Media: Social Science Weighs in. *Critical Public Health*, 23 (3), 371-80.
- BOMBAK, A. (2014). Obesity, Health at Every Size, and Public Health Policy. *Framing Health Matters*, 104 (2), e60-e67.
- BOND, S. (2011). Obesity in Adolescence is Associated with Severe Obesity in Adulthood and Worsening Health Problems. *Journal of Midwifery and Women's Health*, 56 (2), 180-1.
- BOTTA, R. (2003). For Your Health? The Relationship Between Magazine Reading and Adolescents' Body Image and Eating Disturbances. *Sex Roles*, 48 (9-10), 388-99.
- BREZINA, V, MCENERY, T AND WATTAM, S. (2015). Collocations in Context a New Perspective on Collocation Networks. *International Journal of Corpus Linguistics*, 20 (2), 139-73.
- BROOKES, G, HARVEY, K, CHADBORN, N AND DENING, T. (2018). "Our Biggest Killer": Multimodal Discourse Representations of Dementia in The British Press. *Social Semiotics*, 28 (3), 371-95.

- BROWN, L. S. (1994). *Subversive Dialogues*. New York: Basic Books.
- BROWNELL, K.D AND RODIN, J. (1994). Medical, Metabolic and Psychological Effects of Weight Cycling. *Archives of Internal Medicine*, 154 (12), 1325-30.
- BURGOINE, T, MACKENBACH, J.D, LAKERVELD, J, FOROUHI, N.G, GRIFFIN, S.J, BRAGE, S, WAREHAM, N.J, AND MONSIVAIS, P. (2017). Interplay of Socioeconomic Status and Supermarket Distance is Associated with Excess Obesity Risk: A UK Cross-Sectional Study. *International Journal of Environmental Research and Public Health*, 14 (11), 1-13.
- BYERLY, C.M, AND ROSS, K. (2006). *Women and the Media: A Critical Introduction*. Oxford: Blackwell Publishing.
- CALDAS-COULTHARD, C.R AND MOON, R. (2010). ‘Curvy, hunky, kinky’: Using Corpora as Tools for Critical Analysis. *Discourse & Society*, 21 (2) 99-133.
- CALSAMIGLIA, H AND LOPEZ-FERRARO, C. (2003). Role and Position of Scientific Voices: Reported Speech in Media. *Discourse Studies*, 5 (2), 147-73.
- CAMBRIDGE DICTIONARY. (2017). [Online]. *Epidemic Meaning*. Available at: <https://dictionary.cambridge.org/dictionary/english/epidemic>. (Last accessed 2/11/2017).
- CANCER RESEARCH UK. (2020). [Online]. *Obesity, Weight and Cancer*. Available at: <https://www.cancerresearchuk.org/about-cancer/causes-of-cancer/obesity-weight-and-cancer> (Last Accessed 01/04/2020).
- CARELS, R.A, BURMEISTER J, OEHLHOF, M.W, HINMAN, N, LEROY, M, BANNON, E, KOBALL, A AND ASHRAFLOUN, L. (2013). Internalized Weight Bias: Ratings of the Self, Normal Weight, and Obese Individuals and Psychological Adjustment. *Journal of Behavioural Medicine*, 36 (1), 86-94.

- CARLIN, D.B AND WINFREY, K.L. (2009). Have You Come a Long Way, Baby? Hillary Clinton, Sarah Palin, and Sexism in 2008 Campaign Coverage. *Communication Studies*, 60 (4), 326-43.
- CASS. (2020). [Online]. Representations of Obesity in the News. Available at: <http://cass.lancs.ac.uk/corpus-approaches-to-healthcare-communication/representations-of-obesity-in-the-news/>. (Last Accessed 10/05/2020).
- CHARLES, M.A, PETTITT, D.J, SAAD, M.F, NELSON, R.G, BENNETT, P.H AND KNOWLER, W.C. (1993). Development of Impaired Glucose Tolerance With or Without Weight Gain. *Diabetes Care*, 16 (4), 593-96.
- CHARTERIS-BLACK, J. (2014). *Analysing Political Speeches: Rhetoric, Discourse and Metaphor*. Basingstoke: Palgrave Macmillan.
- CHIANG W AND DUANN, R. (2007). Conceptual Metaphors for SARS: ‘War between whom?’. *Discourse and Society*. 18 (5), 579-602.
- CLARK, H.H, AND CLARK, E.V. (1977). *Psychology and Language*. New York: Harcourt Brace Jovanovich.
- CLARKE, A, SHIM, J, MAMO, L, FOSKET, J, AND FISHMAN, J. (2003). Biomedicalization: Technoscientific Transformations of Health, Illness, and U.S. Biomedicine. *American Sociological Review*, 68 (1), 161-94.
- COOPER, C. (1998). *Fat and Proud. The Politics of Size*. London: Women’s Press.
- COOPER, B, LEE, W, GOLDACRE, B AND SANDERS, T. (2011). The Quality of Evidence Given for Dietary Advice Given in UK National Newspapers. *Public Understanding of Science*, 21 (6), 664-73.
- COUCH, D, THOMAS, S.L, LEWIS, S, BLOOD, R.W, AND KOMESAROFF, P. (2015). Obese Adults’ Perceptions of News Reporting on Obesity: The Panopticon and Synopticon at Work, *SAGE Open*, 5 (4), 1-14.

- CRAMER, P AND STEINWERT, T. (1998). Thin is Good, Fat is Bad: How Early Does It Begin? *Journal of Applied Developmental Psychology*, 19 (3), 429-51.
- CRIMSON HEXAGON. (2015). [Online]. *UK Consumer Trend Reports*. Available at: <file:///C:/Users/ritin/Downloads/UK%20Consumer%20Trends%20Report.pdf>. (Last Accessed 05/12/2019).
- CRYSTAL, D. (2004). *Rediscover Grammar* (3rd edn). Essex: Pearson Education.
- DAILLE, B. (1995). Combined Approach for Terminology Extraction: Lexical Statistics and Linguistic Filtering. *Technical Report 5*. Lancaster University: UCREL.
- DANILLA, S, LONGTON, C, VALENZUELA, K, CAVADA, G, NORMANBUENA, H, TABILIO, S, ERAZO, C, BENITEZ, S, SEPULVEDA, S, SCHULZ, R AND ANDRADES, P. (2013). Suction-Assisted Lipectomy Fails to Improve Cardiovascular Metabolic Markers for Disease: A Meta-Analysis. *Journal of Plastic, Reconstructive and Aesthetic Surgery*, 66 (11), 1557-63.
- DECKER W.H. (1987). Attributions Based on Managers' Self-Presentation, Sex, and Weight. *Psychological Reports*, 61, 175–81.
- DEHÉ, N. (2014). *Parentheticals in Spoken English: The Syntax-Prosody Relation (Studies in English Language)*. Cambridge: Cambridge University Press.
- DERALD-WING, S, CAPODILUPO, C.M, TORINO, G.C, BUCCERI, J.M, HOLDER, A.M.B, NADAL, K.L, AND ESQUILIN, M. (2007). Racial Microaggressions in Everyday Life: Implications for Clinical Practice. *American Psychologist*, 62 (4), 271-86.
- DIAZ, V, MAINOUS, A.G AND EVERETT, C.J. (2005). The Association Between Weight Fluctuation and Mortality: Results from a Population-Based Cohort Study. *Journal of Community Health*, 30 (3), 153-65.

- DURSO, L.E, LATNER, J.D AND CIAO, A.C. (2016). Weight Bias Internalization in Treatment-Seeking Overweight Adults: Psychometric Validation and Associations with Self-Esteem, Body Image, and Mood Symptoms. *Eating Behaviours*, 21 (1), 104-08.
- ELLER, G. (2014). On Fat Oppression. *Kennedy Institute of Ethics Journal*, 24 (3), 219-45.
- ENNS, C. Z. (2004). *Feminist Theories and Feminist Psychotherapies: Origins, Themes and Diversity* (2nd ed.) New York: Haworth.
- ENTMAN, R.M. (1993). Framing: Toward Clarification for a Fractured Paradigm. *Journal of Communication*, 43 (4), 51-58.
- EPIPHANIOU, E AND OGDEN, J. (2010). Successful Weight Loss Maintenance and a Shift in Identity: From Restriction to a New Liberated Self. *Journal of Health Psychology*, 15 (6), 887-96.
- EQUALITY ACT 2010. (c.15) [Online]. *London: The Stationary Office*. Available at: <http://www.legislation.gov.uk/ukpga/2010/15/contents>. (Last accessed 31/03/2020).
- ETHAN, D, BASCH, C.H, HILLYER, G.C, BERDNIK, A AND HUYNH, M. (2016). An Analysis of Weight Loss Articles and Advertisements in Mainstream Women's Health and Fitness Magazines. *Health Promotion Perspectives*, 6 (2), 80-84.
- FANG, Y (2011). On Evaluation of the Theoretical Soundness of Critical Discourse Analysis. *Theory and Practice in Language Studies*, 1 (7), 875-78.
- FAIRCLOUGH, N (1992). *Discourse and Social Change*. Cambridge: Polity Press.
- FAIRCLOUGH, N (2010). *Critical Discourse Analysis: The Critical Study of Language* (2nd ed). Harlow: Pearson Education Ltd.

- FAIRCLOUGH, N. (2013). *Language and Power* (2nd ed). London: Routledge.
- FETZER, A. (2008). “And I Think That Is a Very Straightforward Way of Dealing With It”
The Communicative Function of Cognitive Verbs in Political Discourse. *Journal of Language and Social Psychology*, 27 (4), 384-96.
- FLOWERDEW, J. (2002). Rhetorical Strategies and Identity Politics in the Discourse of Colonial Withdrawal. *Journal of Language and Politics*, 1 (1), 149-80.
- FORBES, Y AND DONAVON, C. (2019). The Role of Internalised Weight Stigma and Self-Compassion in The Psychological Well-Being of Overweight and Obese Women. *Australian Psychologist*, 54 (6), 471-82.
- FOWLER, R. (1991). *Language in the News: Discourse and Ideology in the Press*. London: Routledge.
- FREEMAN, J. (1983). *Social Movements of the Sixties and Seventies*. New York: Longman.
- GABLASOVA, D, BREZINA, V AND MCENERY, T. (2017). Collocations in Corpus-Based Language Learning Research: Identifying, Comparing and Interpreting the Evidence. *Language Learning*, 67 (1), 155–79.
- GABRIELATOS, C. (2018). Keyness Analysis: Nature, Metrics and Techniques. In: C. Taylor and A. Marchi (eds) *Corpus Approaches to Discourse: A Critical Review*. London: Routledge, pp. 225-258.
- GARD, M AND WRIGHT, J (2005). *The Obesity Epidemic: Science, Morality and Ideology*. London: Routledge.
- GEE, J.P. (2014). *An Introduction to Discourse Analysis Theory and Method* (4th ed). Oxen: Routledge.
- GEIER A.B, SCHWARTZ M.B AND BROWNELL K.D. (2003) “Before and After” Diet Advertisements Escalate Weight Stigma. *Eating Weight Disorders*, 8 (4), 282-88.

- GILL, R. (2009). Supersexualize me! Advertising and the mid-riffs. In: Attwood F (ed.) *The Sexualization of Western Culture: Mainstreaming Sex*. London: I.B. Tauris, 93-111.
- GILMAN, E.A AND KNOX, E.G. (1998). Geographical Distribution of Birth Places of Children with Cancer in the UK. *British Journal of Cancer*, 77, 842-49.
- GOLDACRE, B. (2009). Media Misinformation and Health Behaviours. *Lancet Oncology*, 10 (9), 848.
- GORDIS, L (2004). *Epidemiology* (3rd edn). Philadelphia: Elsevier Saunders.
- GROL-PROKOPCZYK, H. (2010). Who Says Obesity is an Epidemic? How Excess Weight Became an American Health Crisis. In: A. Mukherjea, (ed) *Understanding Epidemics: Social and Political Approaches*. Bingley: Emerald, pp. 343-58.
- HAINES, J, NEUMARK-SZTAINER, D, EISENBERG, M.E AND HANNAN P.J. (2006) Weight Teasing and Disordered Eating Behaviours in Adolescents: Longitudinal Findings from Project EAT (Eating Among Teens). *Journal of Adolescent Health*, 38 (6), 675-83.
- HALL, S, CRICHTNER, C, JEFFERSON, T, CLARKE, J, AND ROBERTS, B. (1978). *Policing the Crisis: Mugging, The State and Law and Order*. London: Macmillan.
- HALLIN, D.C AND MANCINI, P. (2004). *Comparing Media Systems: Three Models of Media and Politics*. Cambridge: Cambridge University Press.
- HANSEN, A. (1994). Journalistic Practices and Science Reporting in the British Press. *Public Understanding of Science*, 3 (2), 111-34.
- HARMAN, R.M, AHN, S AND BOGUE, B. (2016). Reflective Language Teacher Education: Fostering Discourse Awareness Through Critical Performative Pedagogy. *Teaching and Teacher Education*, 59, 228-38.
- HARPER, B AND TIGGEMANN, M. (2008). The Effect of Thin Ideal Media Images on Women's Self-Objectification, Mood, and Body Image. *Sex Roles*, 58 (9), 649-57.

- HARRISON, K AND CANTOR, J. (1997). The Relationship Between Media Consumption and Eating Disorders. *Journal of Communication*, 47 (1), 40-67.
- HARRY, J.C. (2014). Journalistic Quotation: Reported Speech in Newspapers from a Semiotic Linguistic Perspective. *Journalism*, 15 (8), 1041-58.
- HEALTH AND SOCIAL CARE INFORMATION CENTRE (2006). [Online]. *Health Survey for England Trend Tables*. Health and Social Care Information Centre, Leeds, 2007. Available at: <http://content.digital.nhs.uk/pubs/hse06trends>. (Last accessed 04/01/2020).
- HEALTH AND SOCIAL CARE INFORMATION CENTRE (2007). [Online]. *Health Survey for England Trend Tables*. Health and Social Care Information Centre, Leeds, 2008. Available at: <http://content.digital.nhs.uk/catalogue/PUB00415>. (Last accessed 04/01/2020).
- HEALTH AND SOCIAL CARE INFORMATION CENTRE (2008). [Online]. *Health Survey for England Trend Tables*. Health and Social Care Information Centre, Leeds, 2009. Available at: <http://content.digital.nhs.uk/pubs/hse08trends>. (Last accessed 04/01/2020).
- HEALTH AND SOCIAL CARE INFORMATION CENTRE (2009). [Online]. *Health Survey for England Trend Tables*. Health and Social Care Information Centre, Leeds, 2010. Available at: <http://content.digital.nhs.uk/pubs/hse09report>. (Last accessed 04/01/2020).
- HEALTH AND SOCIAL CARE INFORMATION CENTRE (2010). [Online]. *Health Survey for England Trend Tables*. Health and Social Care Information Centre, Leeds, 2011. Available at: <https://www.noo.org.uk/news.php?nid=1776>. (Last accessed 04/01/2020).

HEALTH AND SOCIAL CARE INFORMATION CENTRE (2011). [Online]. *Health Survey for England Trend Tables*. Health and Social Care Information Centre, Leeds, 2012.

Available at: <http://content.digital.nhs.uk/catalogue/PUB09300>. (Last accessed 04/01/2020).

HEALTH AND SOCIAL CARE INFORMATION CENTRE (2012). [Online]. *Health Survey for England Trend Tables*. Health and Social Care Information Centre, Leeds, 2013.

Available at: <http://content.digital.nhs.uk/catalogue/PUB13219>. (Last accessed 04/01/2020).

HEALTH AND SOCIAL CARE INFORMATION CENTRE (2013). [Online]. *Health Survey for England Trend Tables*. Health and Social Care Information Centre, Leeds, 2014.

Available at: <http://content.digital.nhs.uk/catalogue/PUB16076>. (Last accessed 04/01/2020).

HEALTH AND SOCIAL CARE INFORMATION CENTRE (2014). [Online]. *Health Survey for England Trend Tables*. Health and Social Care Information Centre, Leeds, 2015.

Available at: <http://content.digital.nhs.uk/catalogue/PUB19295>. (Last accessed 04/01/2020).

HEALTH AND SOCIAL CARE INFORMATION CENTRE (2015). [Online]. *Health Survey for England Trend Tables*. Health and Social Care Information Centre, Leeds, 2016.

Available at: <http://content.digital.nhs.uk/catalogue/PUB16988>. (Last accessed 04/01/2020).

HEALTH AND SOCIAL CARE INFORMATION CENTRE (2016). [Online]. *Health Survey for England Trend Tables*. Health and Social Care Information Centre, Leeds, 2017.

Available at:

<https://webarchive.nationalarchives.gov.uk/20180308000544/http://digital.nhs.uk/catalogue/PUB30169>. (Last Accessed 04/01/2020).

- HEINE, B. (1993). *Auxiliaries: Cognitive Forces and Grammaticalization*. New York: Oxford University Press.
- HENDRICKS, R.K, DEMJÉN, Z, SEMINO, E AND BORODITSKY, L. (2018). Emotional Implications of Metaphor: Consequences of Metaphor Framing for Mindset about Cancer. *Metaphor and Symbol*, 33 (4), 267-79.
- HERMISTON, A. (2010). Who Are You Calling Fat? The Social Construction of the Obesity Epidemic. In: A. Mukherjea (ed) *Understanding Epidemics: Social and Political Approaches*. Bingley: Emerald, pp. 359-69.
- HERNDON, A. (2002). Disparate but Disabled: Fat Embodiment and Disabled Studies. *NWSA Journal*, 14 (3), 120-37.
- HIATT, R.A, AND BREEN, N. (2008). The Social Determinants of Cancer: A Challenge for Transdisciplinary Science. *American Journal of Preventative Medicine*, 35 (2S), 141-50.
- HILL, J. (1998). Dealing with Obesity as a Chronic Disease. *Obesity Research*, 6 (1), 34-38.
- HILL, O AND PETERS, J. (1998). Environmental Contributions to the Obesity Epidemic. *Science*, 299 (5368), 1371-74.
- HÖIJER, B. (2010). Emotional anchoring and objectification in the media reporting on climate change. *Public Understanding of Science*, 19 (6), 717-31.
- HOEY, M. (2005). *Lexical Priming: A New Theory of Words and Language*. London: Routledge.
- HOLBROOK T.L, BARRETT-CONNOR, E AND WINGARD, D.L. (1989). The Association of Lifetime Weight and Weight Control Patterns Among Men and Women in an Adult Community. *International Journal of Obesity*, 13 (5), 723-29.

- HOLLAND, K, BLOOD, R, THOMAS, S, LEWIS, S, KOMESAROFF, P AND & CASTLE, D.J. (2011). 'Our Girth is Plain to See': An Analysis of Newspaper Coverage of Australia's Future 'Fat Bomb'. *Health, Risk and Society*, 13 (1), 31-46.
- HOPPER, P.J. (1991). On Some Principles of Grammaticization. In: E.C. Traugott and B. Heine (eds) *Approaches to Grammaticalization*. Oxford: Oxford University Press, pp. 17-35.
- HUANG, Y (2011). Types of Inference: Entailment, Presupposition, and Implicature. In: W. Bublitz and N. Norrick (eds) *Handbooks of Pragmatics*, De Gruyter Mouton: Berlin, pp. 397-421.
- HUNGER, J.M, MAJOR, B, BLODORN, A AND MILLER, C.T. (2015). Weighed Down by Stigma: How Weight-Based Social Identity Threat Contributes to Weight Gain and Poor Health. *Social and Personality Psychology Compass*, 9 (6), 255-68.
- HYLAND, K. (1999). Academic Attribution: Citation and the Construction of Disciplinary Knowledge. *Applied Linguistics*, 20 (3), 341-67.
- INDEPENDENT PRESS STANDARDS ORGANISATION. (2020). [Online]. *Editor's Code of Practice*. Available at: <https://www.ipso.co.uk/editors-code-of-practice/>. (Last Accessed 31/03/2020).
- JOFFE, H AND HAARHOFF, G. (2002). Representations of Far-Flung Illnesses: The Case of Ebola in Britain. *Social Science and Medicine*, 54 (1), 955-69.
- JONES, R.H. (2012). *Discourse Analysis: A Resource Book for Students*. New York: Routledge.
- JOHNSTONE, B. (2008). *Discourse Analysis* (2nd ed). Oxford: Blackwell Publishing.
- JUN JU, Y, HAN, K.T, LEE, T.H, KIM, W, PARK, J.H AND PARK, E.C. (2016). Association Between Weight Control Failure and Suicidal Ideation in Overweight and Obese Adults: A Cross Sectional Study. *BMC Public Health*, 16(1), 1-11.

- JUVONEN, J, LESSARD, L.M, SCHACTER, H.L AND SUCHILT, L. (2017). Emotional Implications of Weight Stigma Across Middle School: The Role of Weight-Based Peer Discrimination. *Journal of Clinical Child & Adolescent Psychology*, 46 (1), 150-58.
- KASSIRER J AND ANGELL M. (1998). Losing Weight - An Ill-Fated New Year's Resolution. *New England Journal of Medicine*, 338 (1), 52-4.
- KEITH, V.M, NGUYEN, A.W, TAYLOR, R.J, CHATTERS, L.M AND MOUZON, D.M. (2017). Microaggressions, Discrimination, and Phenotype among African Americans: A Latent Class Analysis of the Impact of Skin Tone and BMI. *Sociological Inquiry*, 87 (2), 233-55.
- KILGARRIFF, A. (2001). Comparing Corpora. *International Journal of Corpus Linguistics*, 6 (1), 97-133.
- KILGARRIFF, A, BAISA, V, BUŠTA, J JAKUBÍČEK, M, KOVÁŘ, V, MICHELFIT, J, RYCHLÝ, P AND SUCHOMEL, V. (2014). The Sketch Engine: Ten Years On. *Lexicography*, 1 (1), 7-36
- KILGARRIFF, A, KOVÁŘ, V, KREK, S, SRDANOVIČ, I AND TIBERIUS. C. (2010). A quantitative evaluation of word sketches. *Proceedings of the 14th EURALEX International Congress*: 372-79.
- KILGARRIFF, A., RYCHLY, P, SMRZ, P, AND TUGWELL, D. (2004). The Sketch Engine. In G. Williams & S. Vessier (eds) *Proceedings of the Eleventh EURALEX International Congress*, Lorient: EURALEX, pp. 105–116.
- KIRKMAN, A. (2006). Dementia in the News: The Media Coverage of Alzheimer's Disease. *Australasian Journal of Ageing*, 25 (2), 74-79.
- KISSEBAH, A.H, VYDELINGUM, N, MURRAY, R, EVANS, D.J, KALKHOFF, R.K AND ADAMS, P.W. (1982). Relation of Body Fat Distribution to Metabolic

- Complications of Obesity. *The Journal of Critical Endocrinology and Metabolism*, 54 (2), 254-60.
- KLASSEN M.L, JASPER C.R AND HARRIS R.J. (1993). The Role of Physical Appearance in Managerial Decisions. *Journal of Business and Psychology*, 8 (2), 181–98.
- KLEIN D, NAJMAN J, KOHRMAN A.F AND MUNRO C. (1982). Patient Characteristics that Elicit Negative Responses from Family Physicians. *Journal of Family Practice*, 14 (5), 881–88.
- KLEIN, S, FONTANA, L, YOUNG, L, COGGAN, A.R, KILO, C, PATTERSON, B.W, AND MOHAMMED, B.S. (2004). Absence of an Effect of Liposuction on Insulin Action and Risk Factors for Coronary Heart Disease. *The New England Journal of Medicine*, 350 (25), 2549-57.
- KOLLER, V AND MAUTNER, G. (2004). Computer Applications in Critical Discourse Analysis. In: C. Coffin, A. Hewings and K. O'Halloran (eds) *Applying English Grammar*. London: Arnold, pp. 216-28.
- KRANJEC, A, CARDILLO, E, SCHMIDT, G AND CHATTERJEE, A. (2010). Prescribed Spatial Prepositions Influence How We Think About Time. *Cognition*, 114 (1), 111-16.
- KRISHNAMURTHY, R. (1996). 'Ethnic, Racial and Tribal: The Language of Racism?'. In: C.R. Caldas-Coulthard and M. Coulthard (eds) *Texts and Practices: Readings in Critical Discourse Analysis*, London: Routledge, pp. 129-49.
- KUMARI-CAMPBELL, F. (2008). Exploring Internalized Ableism Using Critical Race Theory. *Disability & Society*, 23 (2), 151-62.
- KUNELIUS, R. AND RENVALL, M. (2010). Stories of a Public: Journalism and the Validity of Citizens' Testimonies. *Journalism*, 11 (5), 515-29.
- LAKOFF, G AND JOHNSON, M (1980). *Metaphors We Live By*. Chicago: Chicago Press.

- LANTZ, P.M, GOLBERSTEIN, E, HOUSE, J.S AND MORENOFF, J. (2010).
Socioeconomic and Behavioural Risk Factors for Mortality in a National 19-Year
Prospective Study of U.S. Adults. *Social Science Medicine*, 70 (10), 1558-566.
- LAWLESS, M AND AUGOUSTINOS, M. (2017). Brain Health Advice in the News:
Managing Notions of Individual Responsibility in Media Discourse on Cognitive
Decline and Dementia. *Qualitative Research in Psychology*, 14 (1), 62-80.
- LAWSON-TANCRED, H.C (2004). *Aristotle The Art of Rhetoric*. London: Penguin Books.
- LAWRENCE, R. (2004). Framing Obesity: The Evolution of News Discourse on a Public
Health Issue. *International Journal of Press/Politics*, 9 (3), 57-75.
- LEASK, J, HOOKER, C AND KING, C. (2010). Media Coverage of Health Issues and how
to Work More Effectively with Journalists: A Qualitative Study. *BMC Public Health*,
10 (535), 1-7.
- LENS, V. (2002). Welfare Reform, Personal Narratives and the Media: How Welfare
Recipients and Journalists Frame the Welfare Debate. *Journal of Poverty*, 6 (2), 1-20.
- LEVINSON, S (1983). *Pragmatics*. Cambridge: Cambridge University Press.
- LEVY, B AND PILVER, C. (2012). Residual Stigma: Psychological Distress Among the
Formally Overweight. *Social Science and Medicine*, 75 (2), 297-99.
- LEW, A.M, MANN, T, MYERS, H, TAYLOR, S AND BOWER, J. (2007). Thin-Ideal
Media and Women's Body Dissatisfaction: Prevention using Downward Social
Comparisons on Non-Appearance Dimensions. *Sex Roles*, 57 (7), 543-56.
- LEWIS, S, THOMAS, S.L, BLOOD, R.W, CASTLE, D.J, HYDE, J AND KOMESAROFF,
P.A. (2011). How Do Obese Individuals Perceive and Respond to the Different Types
of Obesity Stigma That They Encounter in Their Daily Lives? A Qualitative Study.
Social Science and Medicine, 73 (9), 1349-56.

- LOUW, B. (1993). Irony in the Text or Insincerity in the Writer? The Diagnostic Potential of Semantic Prosodies. In: M. Baker, G. Francis and E. Tognini-Bonelli (eds) *Text and Technology: In Honour of John Sinclair*. Amsterdam/Philadelphia: John Benjamins, pp. 157–76.
- LUPTON, D AND CHAPMAN, S. (1995). A Healthy Lifestyle Might be the Death of you: Discourses on Diet, Cholesterol Control and Heart Disease in the Press and Among the Lay Public. *Sociology of Health and Illness*, 17 (4), 177-94.
- MA, M.I. (2014). An Analysis of the Representation of Female Members of The United Kingdom Parliament in the British Press. *European Scientific Journal*, 2, 182-91.
- MACDONALD, M (2000). Rethinking Personalization in Current Affairs Journalism. In: C. Sparks and B. Zelizer (eds) *Tabloid Tales: Global Debates over Media Standards*. Oxford: Rowman & Littlefield, pp. 251–66.
- MACHIN, D AND MAYR, A. (2012). *How to do Critical Discourse Analysis: A Multimodal Analysis*. London: SAGE Publications Ltd.
- MALONE, R, BOYD, E AND BERO, L. (2000). Science in the News: Journalists' Construction of Passive Smoking as a Social Problem. *Social Studies of Science*, 30 (5), 713-35.
- MALTERUD, K AND ULRIKEN, K. (2010). 'Norwegians Fear Fatness More than Anything Else' A Qualitative Study of Normative Newspaper Messages on Obesity and Health. *Patient Education and Counselling*, 81 (1), 47-52.
- MANNING-MILLER, C. (1994). Media Discourse and the Feminization of Poverty. *Explorations in Ethnic Studies*, 17 (4), 79-88.
- MARCOVITCH, H. (2005). *Black's Medical Dictionary* (41st edn). London: A&C Black
- MARONEY, D AND GOLUB, S. (1992). Nurses' Attitudes Toward Obese Persons and Certain Ethnic Groups. *Perceptual and Motor Skills*, 75 (2), 387-91.

- MAUTNER, G. (2007). Mining Large Corpora for Social Information: The Case of Elderly. *Language in Society*, 36 (1), 51-72.
- MAYOR, S. (2017). Socioeconomic Disadvantage is Linked to Obesity Across Generations. *British Medical Journal*, 356, DOI: <https://doi.org/10.1136/bmj.j163>.
- MCENERY, T AND HARDIE, A. (2012). *Corpus Linguistics: Method, Theory and Practice*. Cambridge: Cambridge University Press.
- MCENERY, T, MCGLASHAN, M AND LOVE, R. (2015). Press and Social Media Reaction to Ideologically Inspired Murder: The Case of Lee Rigby. *Discourse and Communication*, 9 (2), 1-23.
- MELEO-ERWIN, Z.C. (2011). ‘A Beautiful Show of Strength’: Weight loss and the Fat Activist Self. *Health*, 15 (2), 188–205.
- MERLETTI, F, GALASSI, C, AND SPADEA, T. (2011). The Socioeconomic Determinants of Cancer. *Environmental Health*, 10 (1), 2-7.
- MERRIAM WEBSTER. (2017). [Online]. *Epidemic*. Available at: <https://www.merriam-webster.com/dictionary/epidemic>. Last Accessed 02/11/2017.
- MERRIAM WEBSTER. (2019a). [Online]. *Correlation*. Available at: <https://www.merriam-webster.com/dictionary/correlation>. Last accessed 03/04/2019.
- MERRIAM WEBSTER. (2019b). [Online]. *Cause*. Available: <https://www.merriam-webster.com/dictionary/cause>. Last Accessed: 03/04/2019.
- MERRIAM WEBSTER. (2019c). [Online]. *Contradict*. Available at: <https://www.merriam-webster.com/dictionary/contradict>. Last Accessed: 27/03/2019.
- MERRIAM WEBSTER. (2019d). [Online]. *Better*. Available at: <https://www.merriam-webster.com/dictionary/better>. Last Accessed: 12/11/2019.
- MEYER, C. (2002). *English Corpus Linguistics: An Introduction*. Cambridge: Cambridge University Press.

- MORRIS, R.D AND RIMM, A.A. (1992). Long Term Weight Fluctuation and Non-Insulin Dependent Diabetes Mellitus in White Women. *Annals of Epidemiology*, 2 (5), 657-64.
- MNTUNGWA, M AND NGEMA, L. (2018) “He Mustn’t be too Much”: Exploring Notions of Internalised Homophobia in Date My Family. *Agenda*, 32 (3), 62-73.
- MUNRO, L. (2017). Everyday Indignities: Using the Microaggression Framework to Understand Weight Stigma. *Journal of Law, Medicine and Ethics*, 45 (4), 502-9.
- MURRAY, R. (2010). *Cracking the Highest Glass Ceiling: A Global Comparison of Women’s Campaigns for Executive Office*. California: Praeger.
- MYERS, A AND ROSEN, J.C (1999). Obesity Stigmatisation and Coping: Relation to Mental Health Symptoms, Body Image and Self-Esteem. *International Journal of Obesity*, 23(3), 221-30.
- NAIRN, R.G, AND COVERDALE, J.H. (2005). People Never See Us Living Well: An Appraisal of the Personal Stories About Mental Illness in a Prospective Print Media Sample. *Australian and New Zealand Journal of Psychiatry*, 39 (4), 281-87.
- NATIONAL ASSOCIATION TO ADVANCE FAT ACCEPTANCE (NAAFA). (2020). [Online]. *About us*. Available at:
<https://www.naafaonline.com/dev2/about/index.html>. (Last accessed 08/02/2020).
- NATIONAL ASSOCIATION TO ADVANCE FAT ACCEPTANCE (NAAFA). (2020). [Online]. *Official Policies*. Available at:
<https://www.naafaonline.com/dev2/about/docs.html>. (Last accessed 08/02/2020).
- NEUMARK-SZTAINER, D, STORY, M AND HARRIS, T. (1999). Beliefs and Attitudes about Obesity among Teachers and School Health Care Providers Working with Adolescents. *Journal of Nutrition Education and Behaviour*, 31 (1), 3-9.

- NOLAN, L.J AND ESHLEMEN, A. (2016). Paved with Good Intentions: Paradoxical Eating Responses to Weight Stigma. *Appetite*, 102 (1), 15-24.
- O'BRIEN, K.S, LATNER, J.D, PUHL, R.M, VARTANIAN, L.R, GILES, C, GRIVA, K AND CARTER, A. (2016). The Relationship Between Weight Stigma and Eating Behaviour is Explained by Weight Bias Internalization and Psychological Distress. *Appetite*, 102, 70-76.
- OGDEN, J AND CLEMENTI, C. (2010). The Experience of Being Obese and the Many Consequences of Stigma. *Journal of Obesity*, (1), 1-9. doi:10.1155/2010/429098.
- OLIVER, J.E. (2006). *Fat Politics: The Real Story Behind America's Obesity Epidemic*. New York: Oxford University Press.
- OLSON, E, VISEK, A, MCDONNELL, K AND DIPIETRO, L. (2012). Thinness Expectations and Weight Cycling in a Sample of Middle-Aged Adults. *Eating Behaviours*, 13 (2), 142-45.
- OSBORN, R.L, FORYS, K.L, PSOTA, T.L AND SBROCCO, T. (2011). Yoyo Dieting in African American Women: Weight Cycling and Health. *Ethnicity and Disease*, 21 (3), 274-80.
- ÖSTGAARD, E. (1965). Factors Influencing News Flow. *Journal of Peace Research*, 2 (1), 39-63.
- PALMEIRA, L, PINTO-GOUVEIA, J AND CUNHA, M. (2016). The Role of Weight Self-Stigma on the Quality of Life of Women with Overweight and Obesity: A Multi-Group Comparison Between Binge Eaters and Non-Binge Eaters. *Appetite*, 105, 782-89.
- PALTRIDGE, B. (2012). *Discourse Analysis* (2nd ed). London: Bloomsbury.

- PANTTI, M. AND OJALA, M. (2019). Caught Between Sympathy and Suspicion: Journalistic Perceptions and Practices of Telling Asylum Seekers' Personal Stories. *Media, Culture & Society*, 41 (8), 1031-47.
- PARTINGTON, A. (1998). *Patterns and Meanings: Using Corpora for English Language Research and Teaching*. Amsterdam/Philadelphia: John Benjamins.
- PARTINGTON, A. (2006) 'Metaphors, Motifs and Similes Across Discourse Types: Corpus-assisted Discourse Studies (CADS) at Work'. In: A. Stefanowitsch and S. Gries (eds) *Corpus-based Approaches to Metaphor and Metonymy*. Berlin: Mouton de Gruyter, pp. 267–304.
- PEARL, R. (2018). Weight Bias and Stigma: Public Health Implications and Structural Solutions. *Social Issues and Policy Review*, 12 (1), 146-82.
- PEARL, R.L, WADDEN, T.A, HOPKINS, C.M, SHAW, J.A, HAYES, M.R, BAKIZADA, Z.M, ALFARIS, N, CHAO, A.M, PINKASAVAGE, E, BERKOWITZ, R.I AND ALAMUDDIN, N. (2017). Association Between Weight Bias Internalization and Metabolic Syndrome Among Treatment-Seeking Individuals with Obesity. *Obesity*, 25 (2), 317-22.
- PEEL, E. (2014). 'The Living Death of Alzheimer's' versus 'Take a Walk to Keep Dementia at Bay': Representations of Dementia in Print Media and Carer Discourse. *Sociology of Health and Illness*, 36 (6), 885-901.
- PHELAN, S.M, DOVIDIO, J.F, PUHL, R.M, BURGESS, D.J, NELSON, D.B, YEAZEL, M.W, HARDEMAN, R, PERRY, S AND RYN, M. (2014). Implicit and Explicit Weight Bias in a National Sample of 4,732 Medical Students: The Medical Student CHANGES Study. *Obesity*, 22 (4), 1201-8.

- PILGRIM, K AND BOHNET-JOSCHKO, S. (2019). Selling Health and Happiness: How Influencers Communicate on Instagram about Dieting and Exercise: Mixed Methods Research. *BMC Public Health*, 19 (1), 1-9.
- POLYZOU, A (2015). Presupposition in Discourse: Theoretical and Methodological Issues. *Critical Discourse Studies*, 12 (2), 123-38.
- POTTS, A AND WEARE, S. (2017). Mother, Monster, Mrs, I: A Critical Evaluation of Gendered Naming Strategies in English Sentencing Remarks of Women Who Kill. *International Journal for the Semiotics of Law*, 31 (1), 21-52.
- PUHL, R AND BROWNELL, K. (2001). Bias, Discrimination and Obesity. *Obesity Research*, 9 (12), 788-805.
- PUHL, R AND HEUER, C. (2010). Obesity Stigma: Important Considerations for Public Health. *Framing Health Matters*, 100 (6), 1019-28.
- PUHL, R, HIMMELSTEIN, M AND QUINN, D. (2018). Internalizing Weight Stigma: Prevalence and Sociodemographic Considerations in US Adults. *Obesity*, 26 (1), 167-75.
- PUHL, R, LATNER, J.D, O'BRIEN, K, LEUDICKE, J, DANIELSDOTTIR, S AND FORHAN, M. (2015). Multinational Examination of Weight Bias: Predictors of Anti-Fat Attitudes Across Four Countries. *International Journal of Obesity*, 39 (7) 1166-73.
- PUHL, R, MOSS-RACUSIN C AND SCHWARTZ M. (2007). Internalization of weight Bias: Implications for Binge Eating and Emotional Well-Being. *Obesity*, 15 (1), 19-23.

- PUHL, R, MOSS-RACUSIN, C, SCHWARTZ, M AND BROWNELL, K. (2008). Weight Stigmatization and Bias Reduction: Perspectives of Overweight and Obese Adults. *Health and Education*. 23 (2), 347-58.
- RAPHAEL, D, ANSTICE, S, RAINE, K, McGANNON, K.R, RIZVI, S.K AND YU, V. (2003). The Social Determinants of the Incidence and Management of Type 2 Diabetes Mellitus: Are we Prepared to Rethink our Questions and Redirect our Research Activities. *International Journal of Health Care Quality Assurance*, 16 (4/5), 1-11.
- RICHARDSON, J. E. (2007). *Analysing Newspapers: An Approach from Critical Discourse Analysis*, Basingstoke: Palgrave, Macmillan.
- REISIGL, M AND WODAK, R (2001). *Discourse and Discrimination: Rhetorics of Racism and Antisemitism*, London: Routledge.
- ROSENBERG, C. (1992). *Explaining Epidemics and Other Studies in the History of Medicine*. Cambridge: Cambridge University Press.
- ROSMOND, R (2004). Role of Stress in the Pathogenesis of the Metabolic Syndrome. *Psychoneuroendocrinology*, 30, 1-10.
- ROTHBLUM E.D, MILLER C.T AND GARBUIT B. (1988). Stereotypes of Obese Female Job Applicants. *International Journal of Eating Disorders*, 7 (2), 77–83.
- SAGUY, A. (2013). *What's Wrong with Fat?* Oxford: Oxford University Press.
- SAGUY, A AND ALMELING, R. (2008). Fat in the Fire? Science, the News Media and the 'Obesity Epidemic'. *Sociological Forum*, 23 (1), 53-83.
- SCOTT, M. (1997). PC Analysis of Key Words - and Key Key Words. *System*, 25 (2), 233-45.
- SCOTT, M. (2016) WordSmith Tools. Stroud: Lexical Analysis Software.

- SCLAFANI, J. (2008). The Intertextual Origins of Public Opinion: Constructing Ebonics in The New York Times. *Discourse and Society*, 19 (4), 507-27.
- SEET, A. (2019). Serving the White Nation: Bringing Internalised Racism Within a Sociological Understanding. *Journal of Sociology*, (Online First)
<https://doi.org/10.1177/1440783319882087>
- SEMINO, E (2008). *Metaphor in Discourse*. Cambridge: Cambridge University Press.
- SEMINO, E, DEMJEN, Z, DEMMEN, J.E, KOLLER, V, PAYNE, S, HARDIE, A AND RAYSON, P. (2017). The online use of Violence and Journey Metaphors by Patients with Cancer, as Compared with Health Professionals: A Mixed Methods Study. *BMJ Supportive and Palliative Care*, 7 (1), 60-67.
- SHIUE, I. (2014). Social Correlates of Total Cancer in Adults and the Very Old: UK Understanding Society Cohort, 2009-2010. *Public Health*, 128 (4), 376-79.
- SHROEDER, C. (1992). *Fat is not a Four-Letter Word*. Minneapolis: Chronimed Publishing.
- SHUANGLONG, L, CHEN, Y AND GUANGYE, H. (2018). Laugh and Grow Fat: Happiness Affects Body Mass Index Among Urban Chinese Adults. *Social Science and Medicine*, 208, 55-63.
- SIKORSKI, C, LUPPA, M, GLAESMER, H, BRÄHLER, E, KÖNIG, H.H, RIEDEL-HELLER, S.G. (2013). Attitudes of Health Care Professionals towards Female Obese Patients. *The European Journal of Obesity*, 6 (6), 512-22.
- SINCLAIR, J. (1991). *Corpus, Concordance, Collocation*. Oxford: Oxford University Press.
- SKETCH ENGINE. (2019). [Online]. *Word Sketch About*. Available at:
https://app.sketchengine.eu/#wordsketch?corpname=user%2Fcoltmanpatel%2Freal_1ife_stories&tab=about&sort_ws_columns=f (Last Accessed 21/09/2019).

- SLACK, P. (1992). Introduction, In: T. Ranger and P. Slack (eds) *Epidemics and Ideas: Essays on the Historical Perceptions of Pestilence*. Cambridge: Cambridge University Press, pp. 1-20.
- SMIRNOVA, A.V. (2009). Reported Speech as an Element of Argumentative Newspaper Discourse. *Discourse and Communication*, 3 (1), 79-103.
- SPENDER, D. (1980). *Man Made Language*. London: Routledge & Kegan Paul.
- SOBAL, J. (1999). The Size Acceptance Movement and the Social Construction of Body Weight. In: D. Maurer, & J. Sobal (eds) *Weighty Issues: Fatness and Thinness as Social Problems*. New York: Aldine de Gruyter, pp. 231-49.
- SONTAG, S. (1989). *AIDS and its Metaphors*. London: Penguin Group.
- STOP FUNDING HATE. (2020). [Online]. *About the Campaign*. Available at: <https://stopfundinghate.info/about-the-campaign/> (Last Accessed 09/11/2020).
- STRAWSON, P.F (1952). *Introduction to Logical Theory*. London: Methuen.
- STRYKER, J.E. (2002). Reporting Medical Information: Effects of Press Releases and Newsworthiness on Medical Journal Articles' Visibility in the News Media. *Preventative Medicine*, 35 (5), 519-30.
- STUBBS, M. (1994). Grammar, Text, and Ideology: Computer-Assisted Methods in the Linguistics of Representation. *Applied Linguistics*, 15 (2), 201-23.
- STUNKARD, A.J AND MCLAREN-HUME, M (1959). The Results of Treatment for Obesity. *Archives of Internal Medicine*, 103 (1), 79-85.
- STUNKARD, A.J AND SORENSEN, A. (1993). Obesity and Socioeconomic Status – A Complex Relation. *The New England Journal of Medicine*, 329 (14), 1036-7.
- SULLIVAN, D. A. (2010). A Social Change Model of the Obesity Epidemic. In: A. Mukherjea (ed) *Understanding Epidemics: Social and Political Approaches*. Bingley: Emerald, pp. 315-42.

- SUMITHRAN, P AND PROIETTO, J. (2013). The Defence of Body Weight: The Physiological Basis for Weight Regain After Weight Loss. *Clinical Science*, 124 (4), 231-41.
- SUNDAR, S.S. (1998). Effect of Source Attribution on Perception of Online News Stories. *Journalism and Mass Communication Quarterly*, 75 (1), 55-68.
- SWIFT, J.A, HANLON, S, EL-REDY, L, PUHL, R.M AND GLAZEBROOK, C. (2013). Weight Bias Among UK Trainee Dietitians, Doctors, Nurses and Nutritionists. *Journal of Human Nutrition and Dietetics*, 26 (4), 395-402.
- TEO, P. (2000). Racism in the News: A Critical Discourse Analysis of News Reporting in Two Australian Newspapers. *Discourse and Society*, 11 (1), 7-49.
- TEUBERT, W AND CERMAKOVA, A (2004). Direction in Corpus Linguistics. In: W. Teubert, A. Cermakova, C. Yallop and M.A.K. Halliday (eds) *Lexicology and Corpus Linguistics: An Introduction*. London: Continuum International Publishing, pp. 113-65.
- THIBODEAU, P AND BORODITSKY, L. (2011). Metaphors We Think With: The Role of Metaphor in Reasoning. *PLoS ONE*, 6 (2), 1-11.
- THOMPSON, H.J AND MCTIERNAN, A. (2011). Weight Cycling and Cancer: Weighing the Evidence of Intermittent Caloric Restriction and Cancer Risk. *Cancer Prevention Research*, 4 (11), 1736-42.
- THORNICROFT, G, ROSE, D, KASSAM, A, AND SARTORIUS, N. (2007). Stigma: Ignorance, Prejudice or Discrimination? *British Journal of Psychiatry*, 190 (3), 192-193.
- TITSCHER, S, MEYER, M, WODAK, R AND VETTER, E. (2000). *Methods of Text and Discourse Analysis*. London: Sage Publication.

- TOMIYAMA, J. (2014). Associations of Weight Stigma with Cortisol and Oxidative Stress Independent from Adiposity. *Health Psychology*, 33 (8), 862-67.
- TOGNINI-BONELLI, E. (2001). *Corpus Linguistics at Work*. Amsterdam/Philadelphia: John Benjamin.
- TOURI, M AND KOTEYKO, N. (2015). Using Corpus Linguistic Software in the Extraction of News Frames: Towards a Dynamic Process of Frame Analysis in Journalistic Texts. *International Journal of Social Research Methodology*, 18 (6), 601-16.
- TRIBOLE, E AND RESCH, E. (2012). *Intuitive Eating*. New York: St. Martin's Press.
- TURNER, G, MILLS, S, VAN DER BOM, I, COFFEY-GLOVER, L, PATERSON, L AND JONES, L. (2018). Opposition as Victimhood in Newspaper Debates about Same-Sex Marriage. *Discourse and Society*, 29 (2), 180-97.
- TURNERY, J. (1996). Public Understanding of Science. *The Lancet*, 347 (9008), 1087-90.
- TYLKA, T, ANNUNZIATO, R.A, BURGARD, D, DANÍELSDÓTTIR, S, SHUMAN, E, DAVIS, C AND CALOGERO, R.M. (2014). The Weight-Inclusive versus Weight-Normative Approach to Health: Evaluating the Evidence for Prioritizing Well-Being over Weight Loss. *Journal of Obesity*, 2014, 1-19.
- VAN DIJK, T. (1980). *Macrostructures: An Interdisciplinary Study of Global Structures in Discourse, Interaction, and Cognition*. New Jersey: Lawrence Erlbaum Associates Inc.
- VAN DIJK, T. (1988). *News as Discourse*. New Jersey: Lawrence Erlbaum Associates Inc.
- VAN DIJK, T. (1993a). Principles of Critical Discourse Analysis. *Discourse and Society*, 4 (2), 249-83.
- VAN DIJK, T. (1993b). *Elite Discourse and Racism*. London: Sage Publications.
- VAN DIJK, T. (1998). *Ideology: A Multidisciplinary Approach*. London: Sage Publications.

- VAN DIJK, T. (2001). Multidisciplinary CDA: A Plea for Diversity. In: R. Wodak and M. Meyer (eds) *Methods of Critical Discourse Analysis*. London: Sage Publication, pp. 95-120.
- VAN DIJK, T. (2006). Discourse and Manipulation. *Discourse and Society*, 17(3), 359-89.
- VAN LEEUWEN, T. (2007). Legitimation in Discourse and Communication. *Discourse and Communication*, 1 (1), 91-112.
- VAN LEEUWEN, T. (2008). *Discourse and Practice: New Tools for Critical Discourse Analysis*. Oxford: Oxford University Press.
- VAN LEEUWEN, T. AND WODAK, R. (1999). Legitimising Immigration Controls: A Discourse Historical Analysis. *Discourse Studies*, 1 (1), 83-118.
- VERHAGEN, A. (2005). *Constructions of Intersubjectivity*. Oxford: Oxford University Press.
- WALLIS, P AND NERLICH, B. (2005). Disease Metaphors in New Epidemics: The UK Media Framing of the 2003 SARS Epidemic. *Social Science and Medicine*, 60 (11), 2629-39.
- WAMALA, S, LYNCH, J AND HORSTEN, M. (1999). Education and the Metabolic Syndrome in Women. *Diabetes Care*, 22, 1999-2003.
- WANG, S, BROWNELL, K, AND WADDEN, T. A. (2004). The Influence of the Stigma of Obesity on Overweight Individuals. *International Journal of Obesity*, 28 (10), 1333-7.
- WANN, M. (1999). *FAT!SO? Because You Don't Have to Apologise for Your Size*. Berkeley: Ten Speed Press.
- WANN, M. (2017). Fat Oppression as a Source of Inspiration. A Case History of the Fat?So! Book. *Fat Studies*, 6 (1), 67-76.
- WARDLE, C. (2019). A New World Disorder. *Scientific American*, 321 (3), 88.

- WASHER, P. (2004). Representations of SARS in the British Newspapers. *Science and Medicine*, 59 (12), 2561-71.
- WATKINS, P.L. (2013). Health at Every Size: An End to the War on Obesity? *The European Health Psychologist*, 15 (1) 1-5.
- WATKINS, P.L, FARRELL, A.E AND DOYLE-HUGMEYER, A. (2012). Teaching Fat Studies: From Conception to Reception. *Fat Studies*, 1 (2), 180-194.
- WATT, A (2005). *Beginning Regular Expressions*. Indianapolis: Wiley Publishing Inc.
- WIDDOWSON, H.G. (1995). Discourse Analysis: A Critical Review. *Language and Literature*, 4 (3), 157-72.
- WILLIAMS, A. (2011). Media Evolution and the Public Understanding of Climate Science. *Politics and Life Science*, 30 (2), 20-30.
- WILLIS, L AND KNOBLOCH-WESTERWICK, S. (2014). Weighing Women Down: Messages on Weight Loss and Body Shaping in Editorial Content in Popular Women's Health and Fitness Magazines. *Health Communication*, 29 (4), 323-31.
- WING, R.R AND PHELAN, S. (2005). Long Term Weight Loss Maintenance. *American Journal of Clinical Nutrition*, 82 (1), 222-5.
- WISEMAN, C, GRAY, J.J, MOSIMANN, J.E AND AHRENS, A. (1992). Cultural Expectations of Thinness in Women: An Update. *International Journal of Eating Disorders*, 11 (1), 85-89.
- WODAK, R. (2001). The Discourse Historical Approach. In: R. Wodak and M. Meyer (eds) *Methods of Critical Discourse Analysis*. London: Sage Publication, pp. 63-94.
- WODAK, R. (2011). Complex Texts: Analysing, Understanding, Explaining and Interpreting Meanings. *Discourse Studies*, 13 (5), 623-33.
- WORLD HEALTH ORGANISATION. (2020a). [Online]. *Health Topics: Obesity*. Available at: <https://www.who.int/topics/obesity/en/>. (Last accessed 24/03/2020).

- WORLD HEALTH ORGANISATION. (2020b). [Online]. *Definitions: Emergencies*. Available at: <http://www.who.int/hac/about/definitions/en/>. (Last accessed 03/01/2020).
- WORLD HEALTH ORGANISATION. (2020c). [Online]. *Corona Virus (COVID-19) Pandemic*. Available at: <https://www.who.int/emergencies/diseases/novel-coronavirus-2019>. (Last accessed 13/05/2020).
- XIAO, R. AND MCENERY, T. (2006). Collocation, Semantic Prosody, and Near Synonymy: A Cross-Linguistic Perspective. *Applied Linguistics*, 27 (1), 103-29.
- XIONG, T AND QIAN, Y. (2012). Ideologies of English in a Chinese High School EFL Textbook: A Critical Discourse Analysis. *Asia Pacific Journal of Education*, 32 (1), 75-92.
- YULE, G. (1996). *Pragmatics*. Oxford: Oxford University Press.

8. Appendices

Appendix 1: Daily Express Word Frequency Table

Year	Articles	Words
2006	27	14,460
2007	28	19,450
2008	45	24,437
2009	188	90,614
2010	261	125,305
2011	214	81,197
2012	142	65,313
2013	148	64,325
2014	132	55,672
2015	79	44,532
2016	71	36,321
Total	1,335	621,626

Appendix 2: Daily Mail Word Frequency Table

Year	Articles	Words
2006	226	191,655
2007	350	238,710
2008	311	196,553
2009	145	114,251
2010	119	135,101
2011	191	135,910
2012	143	115,491
2013	151	107,825
2014	231	156,662
2015	216	145,893
2016	157	108,787
Total	2,240	1,646,838

Appendix 3: Daily Star Word Frequency Table

Year	Articles	Words
2006	34	11,085
2007	139	49,417
2008	47	10,316
2009	40	12,623
2010	41	12,008
2011	53	14,677
2012	34	9,015
2013	27	6,495
2014	26	5,981
2015	27	8,069
2016	21	8,174
Total	489	147,860

Appendix 4: Daily Telegraph Word Frequency Table

Year	Articles	Words
2006	125	77,745
2007	180	96,666
2008	168	79,746
2009	91	46,384
2010	143	62,983
2011	120	56,457
2012	249	100,419
2013	226	110,114
2014	268	127,353
2015	225	124,013
2016	107	67,888
Total	1,902	949,768

Appendix 5: The Guardian Word Frequency Table

Year	Articles	Words
-------------	-----------------	--------------

2006	210	137,296
2007	223	158,771
2008	191	119,553
2009	141	93,500
2010	196	159,947
2011	123	102,419
2012	132	109,958
2013	196	170,694
2014	234	172,406
2015	320	309,275
2016	233	234,216
Total	2,199	1,768,035

Appendix 6: The Independent Word Frequency Table

Year	Articles	Words
2006	178	130,200
2007	90	66,492
2008	96	68,386
2009	58	50,267
2010	72	64,864
2011	97	65,961
2012	103	50,113
2013	124	62,838
2014	159	91,127
2015	164	95,884
2016	242	144,377
Total	1,383	890,509

Appendix 7: The Mirror Word Frequency Table

Year	Articles	Words
2006	147	61,435

2007	156	67,090
2008	202	82,164
2009	171	82,656
2010	177	112,497
2011	241	121,550
2012	289	157,926
2013	225	117,537
2014	262	115,423
2015	137	77,753
2016	97	45,851
Total	2,104	1,041,882

Appendix 8: The Sun Word Frequency Table

Year	Articles	Words
2006	97	36,337
2007	102	37,231
2008	154	54,688
2009	171	74,061
2010	116	40,776
2011	136	54,826
2012	243	125,844
2013	194	84,644
2014	230	99,647
2015	326	153,587
2016	215	88,583
Total	1,984	850,224

Appendix 9: The Times Word Frequency Table

Year	Articles	Words
2006	262	163,930
2007	260	170,199

2008	255	148,248
2009	193	140,870
2010	166	112,995
2011	144	117,269
2012	227	157,782
2013	325	223,947
2014	298	194,638
2015	382	230,047
2016	271	173,472
Total	2,783	1,833,397

Appendix 10: Lines of Regular Expression Used to Clean the Corpus

```

.*BYLINE:.* =>
.*LENGTH:.* =>
.*LOAD-DATE:.* =>
.*PUBLICATION-TYPE:.* =>
.*JOURNAL-CODE:.* =>
.*Associated Newspapers Ltd..* =>
.*All Rights Reserved.* =>
.*LANGUAGE:\sENGLISH.* =>
GETTY =>
.*GRAPHIC:.* =>
.*SECTION:.* =>
.*words*. =>
.*Copyright.* =>
.*DOCUMENTS.* =>
Daily\sMail => <Daily\sMail>
DAILY\sMAIL => <DAILY\sMAIL>
Mail\son\sSunday => <Mail\son\sSunday>
MAIL\sON\sSUNDAY => <MAIL\sON\sSUNDAY>
The\sDaily\sTelegraph => <The\sDaily\sTelegraph>
THE\sDAILY\sTELEGRAPH => <THE\sDAILY\sTELEGRAPH>
The\sSunday\sTelegraph => <The\sSunday\sTelegraph>
THE\sSUNDAY\sTELEGRAPH => <THE\sSUNDAY\sTELEGRAPH>
The\sGuardian=> <The\sGuardian>
THE\sGUARDIAN => <THE\sGUARDIAN>
The\sObserver=> <The\sObserver>
THE\sOBSERVER => <THE\sOBSERVER>

```

Observer\s&\sCitizen => <Observer\s&\sCitizen>
 OBSERVER\s&\sCITIZEN => <OBSERVER\s&\sCITIZEN>
 The\sIndependent => <The\sIndependent>
 THE\sINDEPENDENT => <THE\sINDEPENDENT>
 i-Independent\sPrint\sLtd => <i-Independent\sPrint\sLtd>
 I-INDEPENDENT\sPRINT\sLTD => <I-INDEPENDENT\sPRINT\sLTD>
 The\sIndependent\son\Sunday => <The\sIndependent\son\Sunday>
 THE\sINDEPENDENT\son\SUNDAY =>
 <THE\sINDEPENDENT\son\SUNDAY>
 Independent\sExtra => <Independent\sExtra>
 INDEPENDENT\sEXTRA => <INDEPENDENT\sEXTRA>
 The\sMirror => <The\sMirror>
 THE\sMIRROR => <THE\sMIRROR>
 Sunday\sMirror => <Sunday\sMirror>
 SUNDAY\sMIRROR => <SUNDAY\sMIRROR>
 DAILY\sMIRROR => <DAILY\sMIRROR>
 Daily\sMirror => <Daily\sMirror>
 The\sSun => <The\sSun>
 THE\sSUN => <THE\sSUN>
 Sunday\sSun\ (UK) => <Sunday\sSun\s (UK)>
 SUNDAY\sSUN\s (UK) => <SUNDAY\sSUN\s (UK)>
 The\sTimes => <The\sTimes>
 THE\sTIMES => <THE\sTIMES>
 The\sSunday\sTimes\sLondon => <The\sSunday\sTimes\sLondon>
 THE\sSUNDAY\sTIMES\sLONDON => <THE\sSUNDAY\sTIMES\sLONDON>
 Daily\sExpress => <Daily\sExpress>
 DAILY\sEXPRESS => <DAILY\sEXPRESS>
 Sunday\sExpress => <Sunday\sExpress>
 SUNDAY\sEXPRESS => <SUNDAY\sEXPRESS>
 Daily\sStar => <Daily\sStar>
 DAILY\sSTAR => <DAILY\sSTAR>
 Daily\sStar\sSunday => <Daily\sStar\sSunday>
 DAILY\sSTAR\sSUNDAY => <DAILY\sSTAR\sSUNDAY>
 Monday => <Monday>
 Tuesday => <Tuesday>
 Wednesday => <Wednesday>
 Thursday => <Thursday>
 Friday => <Friday>
 Saturday => <Saturday>
 Sunday => <Sunday>

January => <January>
 February => <February>
 March => <March>
 April => <April>
 May => <May>
 June => <June>
 July => <July>
 August=> <August>
 September => <September>
 October => <October>
 November => <November>
 December => <December>

Appendix 11: Obesity Collocates

N	Word	Set	Texts	Total
1	OBESITY		11	50361
2	THE		11	28050
3	TO		11	16280
4	OF		11	16263
5	#		11	15518
6	AND		11	12473
7	IN		11	11482
8	A		11	10359
9	IS		11	9130
10	THAT		11	5208
11	FOR		11	4634
12	CHILDHOOD		11	4482
13	ON		11	4300
14	AS		11	3875
15	SAID		11	3571
16	WITH		11	3500
17	ARE		11	3398
18	PAGE		11	3298
19	BY		11	3065
20	EPIDEMIC		11	2949
21	BE		11	2843
22	AN		11	2719
23	HEALTH		11	2636
24	IT		11	2586
25	HAS		11	2585
26	NATIONAL		11	2420
27	HAVE		11	2406
28	CRISIS		11	2323
29	DIABETES		11	2230
30	TACKLE		11	2127
31	AT		11	2041
32	BUT		11	1887
33	LEVELS		11	1804
34	WE		11	1789

35	CHILD	11	1734
36	FROM	11	1695
37	PROBLEM	11	1682
38	FORUM	11	1623
39	CHILDREN	11	1619
40	NOT	11	1608
41	WILL	11	1605
42	WAS	11	1591
43	RATES	11	1585
44	RISK	11	1566
45	MORE	11	1515
46	EDITION	11	1400
47	WHICH	11	1395
48	THIS	11	1390
49	ABOUT	11	1380
50	LONDON	11	1379

Appendix 12: Quote Topics Broadsheet vs Tabloid Frequencies

Quote Topics	Broadsheet (n=4,416)	Tabloid (n=5,470)	Total (n=9,886)
Obesity Can Cause X	1,399 (31.7%)	1,901 (34.8%)	3,300 (33.4%)
Approaches to Health (Weight-Normative)	794 (18%)	1,311 (24%)	2,105 (21.3%)
Causes of Obesity (Personal Responsibility)	686 (15.5%)	820 (15%)	1,506 (15.2%)
Causes of Obesity (External Factors)	605 (13.7%)	488 (8.9%)	1,093 (11.1%)
Prevalence	206 (4.6%)	209 (3.8%)	415 (4.2%)
Burden on Public Resources	177 (4%)	234 (4.3%)	411 (4.2%)
Approaches to Health (Weight-Inclusive)	140 (3.2%)	200 (3.7%)	340 (3.4%)
Sugar Can Cause X	127 (2.9%)	125 (2.3%)	252 (2.5%)
Pro Sugar Tax	101 (2.3%)	41 (0.7%)	142 (1.4%)
Stigma	71 (1.6%)	61 (1.1%)	132 (1.3%)
Critiquing Government Strategies	37 (0.8%)	21 (0.4%)	58 (0.6%)
BMI Paradox	36 (0.8%)	29 (0.5%)	65 (0.7%)
Obesity Paradox	28 (0.6%)	27 (0.5%)	55 (0.6%)
Pro Fat Tax	8 (0.2%)	2 (0.03%)	10 (0.1%)
Against Tax	1 (0.02%)	1 (0.02%)	2 (0.02%)